

**IN THE UNITED STATES DISTRICT COURT
FOR THE DISTRICT OF DELAWARE**

AFFYMETRIX, INC.,

Plaintiff/Counter-Defendant,

v.

ILLUMINA, INC.,

Defendant/Counter-Plaintiff.

Civil Action No.: 04-901-JJF

ILLUMINA, INC.'S PROPOSED FINAL JURY INSTRUCTIONS

Pursuant to D. Del. L.R. 51.1(a), Illumina, Inc. submits the attached Proposed Final Jury Instructions in triplicate. The parties have reached agreement with respect to Jury Instruction Nos. 1.1, 1.2, 1.4, 1.5, 1.5.1, 1.6, 1.7, 1.8, 1.10, 1.11, 3.1, 3.2, 4.2, 4.3, 4.9, 5.13, 5.15, 5.16, 5.19, 7.12, 7.13, 7.14, 7.15, 9.1, 9.2, 9.3, 9.4. Illumina will submit its proposed instructions electronically in WordPerfect format at an appropriate time to be determined by the Court.

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1. GENERAL INSTRUCTIONS^A

1.1. INTRODUCTION [AGREED]¹

Members of the jury, now it is time for me to instruct you about the law that you must follow in deciding this case.

I will start by explaining your duties and the general rules that apply in every civil case.

Then I will explain some rules that you must use in evaluating particular testimony and evidence.

Then I will explain the positions of the parties and the law you will apply in this case.

And last, I will explain the rules that you must follow during your deliberations in the jury room and the possible verdicts that you may return.

Please listen very carefully to everything I say.

You will also have a verdict form, which will list the questions that you must decide in this case.

¹ Source: Adapted from Uniform Jury Instructions For Patent Cases In The United States District Court For The District Of Delaware (March 1993) (hereinafter “1993 Delaware Uniform Instructions”), §1.1; Final Jury Instructions *Power Integrations, Inc. v. Fairchild Semiconductor Int’l Inc.*, C.A. No. 04-1371-JJF, §1.1 (Oct. 6, 2006) (hereinafter “*Power Integrations* Final Instructions”).

1.2. JURORS' DUTIES [AGREED]²

You have two main duties as jurors. The first one is to decide what the facts are from the evidence that you saw and heard here in court. Deciding what the facts are is your job, not mine, and nothing I have said or done during this trial was meant to influence your decision about the facts in any way.

Your second duty is to take the law that I give you, apply it to the facts and decide under the appropriate burden of proof, which party should prevail on any given issue. It is my job to instruct you about the law, and you are bound by the oath that you took at the beginning of the trial to follow the instructions that I give you, even if you personally disagree with them. This includes the instructions that I gave you before and during the trial, and these instructions. All of the instructions are important, and you should consider them together as a whole.

Perform these duties fairly. Do not let any bias, sympathy or prejudice that you may feel toward one side or the other influence your decision in any way.

² Source: 1993 Delaware Uniform Instructions, §1.2.

1.3. BURDEN OF PROOF [DISPUTED]³

This is a civil case in which Affymetrix, Inc. is alleging that Illumina, Inc. is infringing Affymetrix's patents, and in which Illumina is asserting that it does not infringe, and that Affymetrix's patents are invalid and unenforceable. In addition, Illumina alleges that Affymetrix has engaged in unfair competition, and has intentionally interfered with Illumina's contractual and prospective business relations.

Affymetrix has the burden of proving patent infringement and its claim of damages by what is called a preponderance of the evidence. That means Affymetrix has to produce evidence which, when considered in light of all of the facts, leads you to believe that what Affymetrix claims is more likely true than not. To put it differently, if you were to put Affymetrix's evidence and Illumina's evidence on the opposite sides of a scale, the evidence supporting Affymetrix's claims would have to make the scales tip somewhat on Affymetrix's side. If Affymetrix fails to meet its burden for a particular claim, your verdict must be for Illumina on that claim.

In this case, Affymetrix is also alleging that Illumina's infringement was willful. Affymetrix must prove its claims of willful infringement by clear and convincing evidence and not by a preponderance of the evidence, the standard that applies to Affymetrix's other claims in this case. Clear and convincing evidence is evidence that produces an abiding conviction that the truth of a factual contention is highly probable. Proof by clear and convincing evidence is thus a higher burden than proof by a preponderance of the evidence.

³ Affymetrix's proposed instruction does not address Illumina's defenses and counterclaims in this case. To reflect the issues in this case, Illumina has adapted model instructions from the 1993 Delaware Uniform Instructions, §1.3, and Draft Uniform Jury Instructions for Patent Cases in the United States District Court For The District of Delaware (2004) (hereinafter "2004 Draft Delaware Model Instructions").

Illumina contends that Affymetrix's patents-in-suit are invalid and unenforceable. Because a patent is presumed to be valid and enforceable, Illumina has the burden of proving that the patent-in-suit is invalid and/or unenforceable by clear and convincing evidence.

In addition, Illumina is alleging that Affymetrix has engaged in unfair competition, and has intentionally interfered with Illumina's prospective and contractual business relations. Illumina must prove these claims by a preponderance of the evidence.

Those of you who are familiar with criminal cases will have heard the term "proof beyond a reasonable doubt." That burden does not apply in a civil case and does not play any part in this case. Therefore, you should not consider it at all in your deliberations.

1.4. EVIDENCE DEFINED [AGREED]⁴

You must make your decision based only on the evidence that you saw and heard here in court. Do not let rumors, suspicions, or anything else that you may have seen or heard outside of court influence your decision in any way.

The evidence in this case includes only what the witnesses said while they were testifying under oath (including deposition testimony that has been played or read to you), the exhibits that I allowed into evidence, the stipulations that the lawyers agreed to, and the facts that I have judicially noticed.

Nothing else is evidence. The lawyer's statements and arguments are not evidence. Their questions and objections are not evidence. My legal rules are not evidence. Any of my comments or questions are not evidence.

During the trial I may have not let you hear the answers to some of the questions that the lawyers asked. I also may have ruled that you could not see some of the exhibits that the lawyers wanted you to see. And, sometimes I may have ordered you to disregard things that you saw or heard, or I struck things from the record. You must completely ignore all of these things. Do not even think about them. Do not speculate about what a witness might have said or what an exhibit might have shown. These things are not in evidence, and you are bound by your oath not to let them influence your decision in any way.

Make your decision based only on the evidence, as I have defined it here, and nothing else.

⁴ Source: 1993 Delaware Uniform Instructions; *Power Integrations* Final Instructions.

1.5. CONSIDERATION OF EVIDENCE [AGREED]⁵

You should use your common sense in weighing the evidence. Consider it in light of your everyday experience with people and events, and give it whatever weight you believe it deserves. If your experience tells you that certain evidence reasonably leads to a conclusion, you are free to reach that conclusion.

⁵ Source: 1993 Delaware Uniform Instructions; *Power Integrations* Final Instructions.

1.5.1. USE OF NOTES [AGREED]⁶

You may use notes taken during trial to assist your memory. However, you should use caution in consulting your notes. There is always a tendency to attach undue importance to matters that you have written down. Some testimony that is considered unimportant at the time presented, and thus not written down, takes on greater importance later on in the trial in light of all the evidence presented. Therefore, you are instructed that your notes are only a tool to aid your own individual memory and you should not compare notes with other jurors in determining the content of any testimony or in evaluating the importance of any evidence. Your notes are not evidence, and are by no means a complete outline of the proceedings or a list of the highlights of the trial. Above all, your memory should be the greatest asset when it comes time to deliberate and render a decision in this case.

⁶ Source: *Power Integrations* Final Instructions.

1.6. DIRECT AND CIRCUMSTANTIAL EVIDENCE [AGREED]⁷

Now, some of you may have heard the terms “direct evidence” and “circumstantial evidence.”

Direct evidence is simply evidence like the testimony of an eyewitness which, if you believe it, directly proves a fact. If a witness testified that he saw it raining outside, and you believed him, that would be direct evidence that it was raining.

Circumstantial evidence is simply a chain of circumstances that indirectly proves a fact. If someone walked into the courtroom wearing a raincoat covered with drops of water and carrying a wet umbrella, that would be circumstantial evidence from which you could conclude that it was raining.

It is your job to decide how much weight to give the direct and circumstantial evidence. The law makes no distinction between the weight that you should give to either one, nor does it say that one is any better evidence than the other. You should consider all the evidence, both direct and circumstantial, and give it whatever weight you believe it deserves.

⁷ Source: 1993 Delaware Uniform Instructions; *Power Integrations* Final Instructions;.

1.7. CREDIBILITY OF WITNESSES [AGREED]⁸

In determining the weight to give to the testimony of a witness, you should ask yourself whether there was evidence tending to prove that the witness testified falsely about some important fact, or whether there was evidence that at some other time the witness said or did something or failed to say or do something that was different from the testimony he gave at the trial.

You should remember that a simple mistake by a witness does not necessarily mean that the witness was not telling the truth. People may tend to forget some things or remember other things inaccurately. If a witness has made a misstatement, you must consider whether it was simply an innocent lapse of memory or an intentional falsehood, and that may depend upon whether it concerns an important fact or an unimportant detail.

⁸ Source: 1993 Delaware Uniform Instructions; *Power Integrations* Final Instructions.

1.8. NUMBER OF WITNESSES [AGREED]⁹

One more point about the witnesses. Sometimes jurors wonder if the number of witnesses who testified makes any difference.

Do not make any decisions based only on the number of witnesses who testified. What is more important is how believable the witnesses were, and how much weight you think their testimony deserves. Concentrate on that, not the numbers.

⁹ Source: 1993 Delaware Uniform Instructions; *Power Integrations* Final Instructions.

1.9. EXPERT WITNESSES [DISPUTED]¹⁰

When scientific, technical or other specialized knowledge may be helpful to a jury, a person who has special knowledge, skill, education, training, or experience in that technical field, called an expert witness, is permitted to state an opinion on those matters.

The value of this kind of testimony depends upon the qualifications and skill of the witness, the source of the witness's information, and the reasons supplied for any opinions given. You should consider this kind of testimony like all other testimony you hear and weigh it by the same tests. However, as with any other witness, you are not required to accept any expert's opinions. It will be up to you to decide whether to rely upon them.

¹⁰ Affymetrix's instruction is loosely based on the *Power Integrations* Final Instructions adaptation of the 1993 Delaware Uniform Instructions, but improperly omits selected portions of the instruction. Illumina's proposed instruction adopts in its entirety the 2004 Draft Delaware Model Instructions, "Expert Witnesses."

1.10. DEPOSITION TESTIMONY [AGREED]¹¹

During the trial, certain testimony was presented to you by the reading of a deposition transcript or the playing of video tape excerpts from a deposition. This testimony is entitled to the same consideration you would give it had the witnesses personally appeared in court.

¹¹Source: 1993 Delaware Uniform Instructions; *Power Integrations* Final Instructions.

1.11. DEMONSTRATIVE EXHIBITS [AGREED]¹²

During the course of this trial, you have seen many exhibits. Many of these exhibits were admitted as evidence. You will have these admitted exhibits in the jury room for your deliberations. The remainder of the exhibits (including charts and animations) were offered to help illustrate the testimony of the various witnesses. These illustrative exhibits, called “demonstrative exhibits,” have not been admitted, are not evidence, and should not be considered as evidence. Rather, it is the underlying testimony of the witness that you heard when you saw the demonstrative exhibits that is the evidence in this case.

¹² Source: 1993 Delaware Uniform Instructions; *Power Integrations* Final Instructions.

2. THE PARTIES AND THEIR CONTENTIONS

2.1. THE PARTIES [DISPUTED]¹³

This case involves an action for patent infringement arising under the patent laws of the United States, and an action for unfair competition, and intentional interference with contractual and prospective business relations.

In the patent infringement action, the plaintiff is Affymetrix, Inc. and the defendant is Illumina, Inc.

In the actions for unfair competition and intentional interference with contractual and prospective business relations, the plaintiff is Illumina, Inc. and the defendant is Affymetrix, Inc.

I will refer to Affymetrix, Inc. as “Affymetrix” and to Illumina, Inc. as “Illumina.”

¹³ Affymetrix’s proposed instruction does not address Illumina’s counterclaims in this litigation.

2.2. AFFYMETRIX'S CONTENTIONS¹⁴

Affymetrix contends that Illumina has directly infringed and continues to directly infringe various claims of Affymetrix's five patents. Affymetrix also contends that Illumina has indirectly infringed its patents. I will explain the elements of both direct and indirect infringement shortly. Specifically, Affymetrix alleges that Illumina has infringed, and continues to infringe: [list asserted claims.]

I will refer to these five patents collectively as the patents-in-suit, or individually by the last three numbers of the patents.

Affymetrix further contends that Illumina's infringement was willful.

Affymetrix also contends that it is entitled to damages for Illumina's infringement in the form of lost profits on some Illumina sales and a reasonable royalty on other Illumina sales.

¹⁴ Illumina disputes the contentions that Affymetrix identifies in this instruction.

2.3. ILLUMINA'S CONTENTIONS

With respect to the patent infringement action, Illumina denies that its products or uses of its products infringe, literally or under the doctrine of equivalents, any of the asserted claims of the patents-in-suit. Illumina also denies that it either contributed to, or induced, infringement of any claim.

Illumina also contends that the claims of the patents-in-suit are invalid for a number of reasons, including that the inventions claimed were not new, but were instead previously made by others. Illumina contends that the claims are invalid as "anticipated" by the prior art and that Affymetrix derived the claims from the work and publications of others. Illumina also contends that the patents-in-suit are invalid because the claimed invention would have been obvious to a person of ordinary skill in the field of the invention at the time it was made. Illumina also contends that the patents-in-suit are invalid because the patents do not contain a description of each and every limitation of the patent claims, because the patents-in-suit do not contain enough information to teach a skilled person how to make and use the claimed invention without undue experimentation, and because the claims are not definite enough that a skilled person reading them would know what is covered by the claims and what is not.

If Illumina is found to infringe, Illumina contends that Affymetrix is only entitled to a reasonable royalty on the accused products that Affymetrix has proven Illumina made, used, sold, or offered for sale within the United States because Affymetrix lacks sufficient evidence to show that it lost specific sales, that its products competed in the same market, or to quantify any lost profits. If found to infringe, Illumina also contends that such infringement was not willful since Illumina had a good faith belief that the asserted patents were invalid or not infringed.

In addition, Illumina contends that Affymetrix has engaged in unfair competition and intentionally interfered with prospective and contractual business relations in a manner that has

caused Illumina to suffer monetary and irreparable damages, including injury to Illumina's good will and reputation in the marketplace.

2.4. SUMMARY OF ISSUES [DISPUTED]¹⁵

In this case, you must decide the issues according to the instructions I give you. With regard to the patent infringement action, in general these issues are:

1. Whether Affymetrix has proven by a preponderance of the evidence that Illumina has infringed any of the asserted claims of the patents-in-suit.
2. Whether Illumina has proven by clear and convincing evidence that Affymetrix's patents are invalid.
3. Whether Illumina has proven by clear and convincing evidence that Affymetrix's patents are unenforceable.
4. If you find that any of the asserted claims of the patents-in-suit are infringed, not invalid and not unenforceable, whether Affymetrix has proven by clear and convincing evidence that Illumina's infringement of that claim or claims was willful.
5. If you find that any of the asserted claims of the patents-in-suit are infringed, not invalid and not unenforceable, the amount of damages that Affymetrix has proven by a preponderance of the evidence is due to it.

With regard to the actions for unfair competition and intentional interference with contractual and prospective business relations, in general, the issues are:

1. Whether Illumina has proven that Affymetrix's actions were such that they constitute unfair competition.
2. Whether Illumina has proven that Affymetrix intentionally interfered with Illumina's existing contractual relations and/or prospective business relations.

¹⁵ Affymetrix's proposed instruction does not address Illumina's counterclaims in this litigation.

3. If you find that Affymetrix is liable for unfair competition or intentional interference with contractual or prospective business relations, the amount of monetary relief and damages that Illumina has proved by a preponderance of the evidence is due to it.

I will instruct you first regarding the patent infringement action. Once I have read those instructions, I will then instruct you regarding the actions for unfair competition and intentional interference with contractual and prospective business relations.

3. THE PATENT CLAIMS

3.1. PATENT CLAIMS GENERALLY [AGREED]¹⁶

Deciding whether a claim has been directly infringed is a two-step process. First, the meaning of the patent claim is determined as a matter of law. That job is for the Court, and I will tell you shortly what the key terms of the asserted claims mean as a matter of law. In the second step, you must compare each claim as I have interpreted it to each of the accused products to determine whether every element of the claim can be found in that accused product. This element-by-element comparison is your responsibility as the jury for this case.

Before you can decide whether or not Illumina has infringed any of Affymetrix's patents, you will have to understand that patent "claims." Patent claims are the numbered paragraphs at the end of a patent. The patent claims involved here are: [list asserted claims]

The claims are "word pictures" intended to define, in words, the boundaries of the invention described and illustrated in the patent. Only the claims of the patent can be infringed. Neither the specification, which is the written description of the invention, nor the drawings of the patent can be infringed.

Claims may be directed to products or they may be directed to methods for making or using a product.

Claims are typically divided into parts called "elements." For example, a claim that covers the invention of a table may recite the tabletop, four legs and the glue that secures the legs to the table top. The table top, legs and glue are each a separate element of the claim.

When making your decision regarding infringement, you should not compare Illumina's products with any specific example set out in the patents-in-suit, or with any product

¹⁶ Source: 1993 Delaware Uniform Instructions; *Power Integrations* Final Instructions.

manufactured by Affymetrix. Rather, you must only compare Illumina's products with the asserted claims of the patents-in-suit.

Each of the claims must be considered individually, and to show infringement of a given patent by a given product, Affymetrix need only establish that one claim of that patent has been infringed by that product.

3.2. INDEPENDENT AND DEPENDENT CLAIMS [AGREED]¹⁷

There are two different types of claims in a patent. The first type is called an independent claim. An independent claim does not refer to any other claim of the patent. An independent claim is read separately to determine its scope.

On the other hand, a dependent claim refers to and depends upon at least one other claim in the patent and thus incorporates whatever that other claim says. Accordingly, to determine what a dependent claim covers, you must read both the dependent claim and the claim or claims to which it refers.

For example, claim 14 of the '243 patent is an independent claim. You know this because it mentions no other claims. Accordingly, the words of this claim are read by themselves in order to determine what the claim covers.

On the other hand, claim 15 of the '243 patent is a dependent claim. It refers to independent claim 14. For an Illumina product to infringe dependent claim 15 of the '243 patent, the Illumina product must have all the elements of both claim 14 and claim 15. Therefore, if you find that an independent claim is not infringed, you must also find that all claims depending on that claim are not infringed.

Some claims of the patents-in-suit are broader than other claims. You are not to read limitations or words of a narrower or dependent claim into a broader or independent claim if the broader claim does not explicitly contain the same limitations.

¹⁷ Source: 1993 Delaware Uniform Instructions; *Power Integrations* Final Instructions (modified).

3.3. OPEN ENDED OR “COMPRISING” CLAIMS [DISPUTED]¹⁸

The claims of the patents-in-suit use the transitional term “comprising” or “comprises.” “Comprising” and “comprises” are interpreted the same as “including” or “containing.” In patent claims, “comprising” or “comprises,” mean that the claims are open ended.

For example, a claim to a table *comprising* a tabletop, four legs and the glue, would be infringed by a table that includes those elements, even if the table also includes additional elements such as wheels on the table’s legs.

¹⁸ Affymetrix’s instruction incorporates redundant and unnecessary language from the model instructions for the 1993 Delaware Uniform Instruction and 2004 Delaware Model Instructions. Illumina’s proposed instruction is adapted from the 2004 Draft Delaware Model Instructions, § 3.11. Illumina’s instruction is consistent with the model instruction, and eliminates redundant and prejudicial language.

3.4. “CONSISTING OF” CLAIMS [DISPUTED]¹⁹

Certain claims of the patents-in-suit use the language “consisting of.” In interpreting patent claims, these words do not mean the same thing as “comprising,” “including,” “containing” or “consisting essentially of.” Any patent claim including the language “consisting of” is narrower and will be infringed only if you find Illumina’s product or use of that product includes all but no more than the components set forth in the patent claim or clause with this language.

¹⁹ Affymetrix did not proposed an instruction for “consisting of” claims. The source for Illumina’s proposed instruction is the 1993 Delaware Uniform Instructions §3.13 (adapted).

3.5. CONSTRUCTION OF CLAIMS [DISPUTED]²⁰

It is the Court's duty under the law to define what patent claims mean. I have made my determinations and I will now instruct you on the meaning of the claims.

You must apply the meaning that I give in each patent claim to decide if the claim is infringed. You must ignore any different interpretations given to these terms by the witnesses or the attorneys.

It may be helpful to refer to the copy of the patents-in-suit that you have been given as I discuss the claims at issue here. The claims of the patents are toward the end of each patent.

You are advised that the following definitions for the following terms must be applied in the following patents-in-suit:

'243 Patent

- The term "**substrate**," as used in the claims of U.S. Patent No. 6,646,243, means "a material having a rigid or semi-rigid surface."
- The term "**target nucleic acids**," as used in the claims of U.S. Patent No. 6,646,243, means "nucleic acids that are deliberately exposed to the nucleic acids attached to the substrate."

²⁰ Illumina preserves its objections and its right to appeal any and all claim constructions that differ from those proffered by it in its *Markman* briefing and argument. Illumina's proposed instruction follows the model instruction regarding claim construction from the 2004 Draft Delaware Model Instructions. Affymetrix's proposed instruction includes text that is neither included in the Draft Delaware Model Instructions, nor is it consistent with applicable law. In particular, Affymetrix's proposed instruction includes statements that are inconsistent with the following Federal Circuit precedent that provides that claim language is interpreted from the perspective of one of ordinary skill in the art: *MBO Labs v. Becton, Dickinson & Co.*, No. 2006-1062, 2007 WL 163068 (Fed. Cir. 2007) (noting that "[a]scertaining the meaning of the claims requires that they be viewed in the context of those sources available to the public that show what a person of skill in the art would have understood disputed claim language to mean"); *see also Philips v. AWH Corp.*, 415 F.3d 1303, 1315 (Fed. Cir. 2005) (holding "[t]he most relevant source is the patent's specification, which is 'the single best guide to the meaning of a disputed term,' and '[t]he words of patent claims have the meaning and scope with which they are used in the specification and the prosecution history.'").

‘365 Patent

- The phrase “**biological polymers immobilized on a surface**,” as used in the claims of U.S. Patent No. 6,399,365, means “two or more surface-immobilized biological polymers that are recognized by a particular target.”
- The term “**housing**,” as used in the claims of U.S. Patent No. 6,399,365, means “a structure that covers, protects, and supports the probe array.”

‘432 Patent

- The phrase “**said beads being coded with an encoding system**,” as used in the claims of U.S. Patent No. 6,355,432, means “said beads having a property associated with each bead (separate from the binding polymer) that can be used to distinguish one bead from another.”
- The term “**target specific sequence**,” as used in the claims of U.S. Patent No. 6,355,432, means “a known polymer sequence that has affinity for another sequence.”

‘531 Patent

- The term “**probe array**,” as used in the claims of U.S. Patent No. 5,545,531, means “a collection of probes, at least two of which are different, arranged in a spacially defined and physically addressable manner.”
- The phrase “**arranged in a spacially defined and physically addressable manner**,” as used in the claims of U.S. Patent No. 5,545,531, means “located in a particular location and capable of being addressed.”

‘716 Patent

- The term “**probe**,” as used in the claims of U.S. Patent No. 5,795,716, means “a nucleic acid of known sequence that is capable of hybridizing to its complementary sequence.”

- The term “**probe intensity**,” as used in the claims of U.S. Patent No. 5,795,716, means “intensity from a labeled sample nucleic acid hybridized to a probe location.”
- The phrase “**indicating an extent of hybridization**,” as used in the claims of U.S. Patent No. 5,795,716, means “indicating the relative strength of binding.”
- The phrase “**comparison of said plurality of probe intensities to each other**,” as used in the claims of U.S. Patent No. 5,795,716, means “an examination of the probe intensities of two or more probes in relation to each other.”
- The phrase “**generates a base call identifying said unknown base**,” as used in the claims of U.S. Patent No. 5,795,716, means “determines which nucleotide is most likely to be present at a particular position in a nucleic acid sequence.”

4. PATENT INFRINGEMENT

4.1. PATENT INFRINGEMENT GENERALLY [DISPUTED]²¹

A patent owner may enforce its right to stop others from making, using, selling, or offering to sell the patented invention in the United States by filing a lawsuit for patent infringement. Here, Affymetrix, the alleged patent owner, has sued Illumina, the accused infringer, and has alleged that Illumina's products and services infringe one or more claims of Affymetrix's patents-in-suit.

Patent law provides that any person or business entity which makes, uses, sells or offers to sell, without the patent owner's permission, any product, apparatus or method legally protected by at least one claim of a patent within the United States before the patent expires, infringes the patent.

There are several ways to infringe a patent. One may: (1) directly infringe a patent; (2) knowingly induce others to infringe a patent, in which case the inducer is liable for infringement as well as the direct infringer; or (3) contribute to the infringement of a patent by another by supplying a component specially designed for the patented invention, in which case both the direct infringer and the contributory infringer would be liable for patent infringement. Next I will explain each type of infringement more completely.

²¹ Affymetrix's proposed instruction alters unnecessarily the model instruction of the 1993 Delaware Uniform Instructions to add redundant language regarding infringement that is disclosed in Instruction No. 4.3. The source for Illumina's proposed instruction is the 1993 Delaware Uniform Instructions, §4.1. Illumina, however, adapts the model instruction to address the recent *en banc* Federal Circuit holding of *DSU Med. Corp. v. JMA Co.*, 471 F.3d 1293, 1306 (Fed. Cir. 2006) (*en banc*) (holding that "...inducement requires that the alleged infringer knowingly induced infringement and possessed specific intent to encourage another's infringement."). Illumina's proposed instruction more closely follows the model instruction of the 1993 Delaware Uniform Instructions while correctly reflecting the Federal Circuit's *en banc* articulation of the law on inducement in *DSU*.

4.1.1. PATENT OWNERSHIP [DISPUTED]²²

In order to establish that Illumina is liable for infringement, Affymetrix must prove by a preponderance of the evidence that Affymetrix is the owner, assignee or exclusive licensee of the patent-in-suit.

In order to become a patent owner, an inventor must file a patent application and be granted a patent by the U.S. Patent and Trademark Office.

Whether Affymetrix is the patent owner is an issue of fact for you to decide.

In order to show that Affymetrix was the assignee of the patent owner, Affymetrix must prove, by a preponderance of the evidence, that the patent owner in fact assigned Affymetrix the ownership rights in the patent-in-suit.

²² Affymetrix does not propose an instruction for patent ownership. The source for Illumina's proposed instruction is O'Malley, et. al., *Federal Jury Practice & Instructions*, 5th ed. § 158.21.

4.2. DIRECT INFRINGEMENT — KNOWLEDGE OF PATENT OR INTENT TO INFRINGE IS IMMATERIAL [AGREED]²³

Illumina would be liable for directly infringing Affymetrix's patents if you find that Affymetrix has proven by a preponderance of the evidence that Illumina has made, used or sold the invention defined in at least one claim of Affymetrix's patent. 35 U.S.C. § 271(a). Illumina may directly infringe a patent without knowledge that what it is doing is an infringement of the patent. Illumina may also infringe even though in good faith it believes that what it is doing is not an infringement of any patent.

²³Source: 1993 Delaware Uniform Instructions

4.3. LITERAL INFRINGEMENT [AGREED]²⁴

There are two ways in which a patent claim may be directly infringed. First, a claim may be literally infringed. Second, a claim may be infringed under what is called the “doctrine of equivalents,” which I will address shortly.

For one of Illumina’s products to literally infringe any one of Affymetrix’s patent claims, the subject matter of that patent claim must be found in Illumina’s product or use of its product. In other words, one of Affymetrix’s patent claims is literally infringed if one of Illumina’s products or use of its products includes each and every element in that claim. If Illumina’s products or use of its products omits any single component recited in a claim of Affymetrix’s patents, Illumina does not literally infringe that claim. You must determine literal infringement with respect to each patent claim individually.

²⁴Source: 1993 Delaware Uniform Instructions

4.4. DOCTRINE OF EQUIVALENTS [DISPUTED]²⁵

If you do not find literal infringement, you may consider infringement under the doctrine of equivalents. I have referred to the “doctrine of equivalents” before. Now it is time to explain this term.

As I have noted, to infringe a patent, every claim element must be present in the accused product. A claim element may be present in an accused product in one of two ways, either literally or under the doctrine of equivalents. A claim element is literally present if it exists in the accused product just as it is described in the claim, either as I have explained that language to you or, if I did not explain it, as you understand it from the evidence presented during trial.

A claim element is present in an accused product under the doctrine of equivalents if the differences between the claim element and a corresponding aspect of the accused product are insubstantial. One way to determine this is to look at whether or not the accused structure performs substantially the same function, in substantially the same way, to achieve substantially the same result as the element in the claimed invention.

Application of the doctrine of equivalents is on an element-by-element basis, meaning that for Illumina’s products or use of its products to infringe any one of Affymetrix’s asserted claims under the doctrine of equivalents, the element of a patent claim which is not literally present in the accused product must be present by equivalence. Therefore, the question is whether the accused product contains an equivalent for each element of the claim that is not

²⁵ Illumina’s proposed instruction is based upon the 2004 Draft Delaware Model Instructions, and incorporates a provision from the 1993 Delaware Uniform Instructions that reflects Federal Circuit precedent that application of the doctrine of equivalents is the exception, not the rule, and fair notice must be given of what was patented. *See Multiform Desiccants, Inc. v. Medzam, Ltd.*, 133 F.3d 1473, 1480 (Fed. Cir. 1998) (holding “[t]he doctrine of equivalents balances the purpose of fairness to inventors lest the patent be unjustly circumvented, against the purpose of patent claims to state clear boundaries of the patent grant, in fair notice of its scope.”).

literally present in the accused product. The question is not whether the accused product or method as a whole is equivalent to the claimed invention as a whole.

Application of the doctrine of equivalents is the exception, however, not the rule. Patent claims must be clear enough so that the public has fair notice of what was patented. Notice permits other parties to avoid actions which infringe the patent and to design around the patent.

It is not a requirement under doctrine of equivalents infringement that those of ordinary skill in the art knew of the equivalent when the patent application was filed or when the patent issued. The question of whether Illumina's products or services are equivalent to what is defined in Affymetrix's claims is to be determined as of the time of the alleged infringement.

4.5. SITUATIONS WHERE RESORT TO DOCTRINE OF EQUIVALENTS IS NOT PERMITTED [DISPUTED]²⁶

There are situations where resort to the doctrine of equivalents to find infringement is not permitted.

First, resort to the doctrine of equivalents to find infringement is not permitted if you find that Illumina is merely making, using or selling what was in the prior art prior to the patented invention, or what would have been obvious to persons of ordinary skill in the art in light of what was in the prior art. A patent owner should not obtain, under the doctrine of equivalents, protection that it could not have lawfully obtained from the Patent and Trademark Office.

Second, resort to the doctrine of equivalents to find infringement is not permitted if you find that Affymetrix is trying to recapture that which it gave up in the Patent and Trademark Office to distinguish the invention from what was in the public domain prior to the claimed invention. In other words, if Affymetrix, when it was in the process of obtaining its patent, limited the claim in some way in order to argue that it was different from what was in the prior art, then Affymetrix cannot now assert a broader view of the claimed invention by broadening the claims through the doctrine of equivalents in an effort to recapture that which it gave up in order to obtain its patents.

Third, you may not find infringement under the doctrine of equivalents if even one limitation of a claim or its equivalent is missing from the accused product or method. Thus, if you determine that a finding of infringement under the doctrine of equivalents would entirely eliminate a particular claimed element, then you should not find infringement under the doctrine of equivalents.

²⁶ Affymetrix did not propose an instruction for situations where the doctrine of equivalents is not permitted. The sources for Illumina's proposed instruction are the 1993 Delaware Uniform Instructions and the 2004 Draft Delaware Model Instructions.

4.5.1. REVERSE DOCTRINE OF EQUIVALENTS [DISPUTED]²⁷

In some cases, even though an allegedly infringing product or service includes all of the components of at least one of the patent claims, there still may be no infringement. This will be the case where Illumina's product is so far changed in principle that although it performs substantially the same or a similar function to produce substantially the same result as that defined by a patent claim, it does so in a substantially different way.

²⁷ Affymetrix did not propose an instruction for the reverse doctrine of equivalents. The source for Illumina's proposed instruction is the 1993 Delaware Uniform Instructions, § 3.15 (adapted).

4.6. PROSECUTION LACHES [DISPUTED]²⁸

Illumina contends that Affymetrix engaged in prosecution laches, and that Affymetrix's patents were issued after an unreasonable and unexplained delay in prosecution. Refiling a patent application solely for the business purpose of delaying its issuance is an abuse of the patent system, and renders the patents unenforceable due to prosecution laches. If, considering the totality of the circumstances, you find that Illumina has proven by a preponderance of the evidence that Affymetrix's patents issued after an unreasonable and unexplained delay in prosecution of the patents, then Affymetrix's patents-in-suit are rendered unenforceable.

There is no strict time limitation for determining whether continued refiling of patent applications is a legitimate utilization of the patent process, or an abuse of the patent process. Multiple examples of repetitive refilings that demonstrate a pattern of unjustifiably delayed prosecution may trigger prosecution laches. Likewise, when the totality of the circumstances surrounding the prosecution of a series of related patents suggests delay in issuing claims, prosecution laches may be triggered.

²⁸ Affymetrix did not propose an instruction for prosecution laches. The sources for Illumina's proposed instruction are the following authoritative cases: *Symbol Techs., Inc. v. Lemelson Med., Edu. & Research Found., LP*, 422 F.3d 1378, 1384-85 (Fed. Cir. 2005) (affirming district court's judgment of unenforceability due to prosecution laches); *Intuitive Surgical, Inc. v. Computer Motion, Inc.*, No. 01-203-SLR, 2002 WL 31833867, at *5 (D. Del. Dec. 10, 2002) (holding preponderance of the evidence standard applies to prosecution laches claims).

4.7. INDIRECT INFRINGEMENT — GENERALLY [DISPUTED]²⁹

In addition to stopping infringement by those who are directly infringing, a patent owner also has the right to stop those who are known as “indirect infringers.” There are two types of indirect infringers. First, there are those who knowingly encourage others to infringe a patent with specific intent to cause that infringement; this is known as “inducing infringement.” Second, there are those who contribute to infringement by, for example, supplying them with components used in the patented invention. I will explain to you in a moment the precise requirements for finding someone has induced or contributed to infringement by another person.

In this case, Affymetrix accuses Illumina of inducing and contributing to the infringement of the patents-in-suit. It is your job to determine whether Affymetrix has proven inducement and/or contributory infringement by a preponderance of the evidence.

Keep in mind that there can be no indirect infringement unless someone is directly infringing the patent in the United States. Thus, to prove that Illumina is inducing another person to infringe or contributing to the infringement of another, Affymetrix must prove by a preponderance of the evidence that the other person is directly infringing a claim of the patents. Such proof may be based on circumstantial evidence you have heard in this case, rather than direct evidence of infringement.

²⁹Affymetrix’s proposed instruction contains incorrect statements of the law in light of the recent *en banc* holding of the Federal Circuit in *DSU Med. Corp. v. JMA Co.* Source: The source for Illumina’s proposed instruction is the 2004 Draft Delaware Model Instructions, which has been adapted to reflect the Federal Circuit’s recent *en banc* holding of *DSU Med. Corp. v. JMA Co.*, 471 F.3d 1293, 1306 (Fed. Cir. 2006) (holding “inducement requires that the alleged infringer *knowingly induced infringement and possessed specific intent to encourage another’s infringement.*”) (emphasis added).

4.8. INDUCING PATENT INFRINGEMENT [DISPUTED]³⁰

Inducement to infringe requires someone purposefully urging or encouraging another to infringe a patent — inducement to infringe cannot occur unintentionally. This is different from direct infringement, which, as I have told you, can occur without any intent to infringe. To be liable for inducement to infringe, the accused inducer must have known of the patent and actively encouraged or instructed another person how to use a product in a manner that it knew to be infringing and that you, the jury does find infringed the asserted patent claims. Merely having knowledge of the underlying acts of direct infringement by itself is not enough to prove active inducement but rather Affymetrix must prove that Illumina possessed an intent to encourage another to act knowing that such action would infringe the patent.

Thus, to prove that Illumina induced infringement of a patent-in-suit, Affymetrix must prove by a preponderance of the evidence the following three things:

1. Illumina intentionally encouraged or instructed another person how to use a product in a way that Illumina knew to be infringing and that you, the jury, find infringes the patent claims;
2. Illumina knew of the patent-in-suit;
3. The other person infringed an asserted claim of the patent-in-suit.

All three of these things must be proven by either direct or circumstantial evidence before you may find that Illumina induced patent infringement.

³⁰Affymetrix's proposed instruction is an incorrect statement of the law in light of the recent *en banc* holding of the Federal Circuit. See *DSU Med. Corp. v. JMA Co.*, 471 F.3d 1293, 1306 (Fed. Cir. 2006) (holding that "...inducement requires that the alleged infringer knowingly induced infringement and possessed specific intent to encourage another's infringement."). The source for Illumina's proposed instruction is the 2004 Draft Delaware Model Instructions, which has been adapted to reflect the Federal Circuit's recent *en banc* holding of *DSU Med. Corp. v. JMA Co.*, 471 F.3d 1293, 1306 (Fed. Cir. 2006).

4.9. CONTRIBUTORY INFRINGEMENT [AGREED]³¹

A second form of indirect infringement is contributory infringement. Contributory infringement can occur when someone supplies a part that is used to infringe one of the patent claims. The necessary proof to show contributory infringement is focused on the intent of the person supplying the part and the nature of that part. Specifically, to prove contributory infringement by Illumina, Affymetrix must prove by a preponderance of the evidence the following three things:

1. The part supplied by Illumina is not simply a common part used for significant non-infringing uses, but rather, the part is especially made or adapted for a use that infringes the claimed invention.
2. Illumina knew of the patent and sold the accused part knowing that the part was especially made for use in an infringement of the patent.
3. Someone then bought the part and actually used it in a way that infringes each limitation of an asserted claim of the patent.

All three of these things must be proven by direct or circumstantial evidence before you may find that Illumina contributed to the patent infringement.

³¹Source: Adapted from 2003 Delaware Uniform Instructions; 35 U.S.C. §271(c).

4.10. WILLFUL INFRINGEMENT [DISPUTED]³²

Affymetrix contends that Illumina has willfully infringed the asserted claims of the patents-in-suit.

When a person becomes aware that a patent may have relevance to their activities, that person has a duty to exercise due care and investigate whether or not their activities infringe any valid claim of the patent. If that person does not do so and infringes the patent claims, then the infringement is willful.

To prove willful infringement, Affymetrix must prove by the higher burden of clear and convincing evidence, and in view of the totality of the circumstances, that:

1. Illumina was aware of, and acted in disregard of, the patent.
2. Illumina proceeded with its activities without a reasonable good faith belief that the patent was invalid, unenforceable, or that the patent was not infringed.

Keep in mind that a determination by you that Illumina has infringed the patent does not automatically mean that the infringement was willful. As I have explained, the infringement is not willful if Illumina had a good faith belief that it did not infringe or that the patent was invalid, and if its belief was reasonable under all the circumstances.

³² Affymetrix's proposed instruction is contrary to *Knorr-Bremse Systeme Fuer Nutzfahrzeuge GmbH v. Dana Corp.*, 383 F.3d 1337 (Fed. Cir. 2004) (*en banc*). To reflect the holding of the Federal Circuit in *Knorr-Bremse* that there can be no adverse inference suggested due to the decision of an alleged infringer not to rely on the advice of counsel defense, Illumina's proposed instruction adopts certain revisions to the model instruction of the 2004 Draft Delaware Model Instructions as incorporated into the *Tristata Tech., Inc. v. Mary Kay, Inc.*, C.A. No. 01-127-JJF, Final Jury Instructions. Accordingly, Illumina's proposed instruction is consistent with *Knorr-Bremse Systeme Fuer Nutzfahrzeuge GmbH v. Dana Corp.*, 383 F.3d 1337 (Fed. Cir. 2004) (*en banc*) (holding that there can be no adverse inference suggested due to the decision of an alleged infringer not to rely on the advice-of-counsel defense).

5. VALIDITY

5.1. VALIDITY [DISPUTED]³³

Illumina contends that the asserted claims of the patents-in-suit are invalid for failure to satisfy the legal requirements of patentability. In particular, Illumina contends that the asserted claims are invalid for the following reasons:

- Anticipation
- Derivation
- Obviousness
- Lack of Written Description
- Lack of Enablement
- Non-Inventorship
- Indefiniteness

I will now instruct you on each defense.

³³Affymetrix did not propose an introductory instruction regarding Illumina's invalidity contentions. This instruction was added in the 2004 Draft Delaware Model Instructions and provides an introduction to the jury of the validity instructions that follow. The source for Illumina's proposed instruction is the 2004 Draft Delaware Model Instructions (adapted).

5.2. PRESUMPTION OF VALIDITY [DISPUTED]³⁴

The granting of a patent by the Patent and Trademark Office carries with it the presumption that the patent is valid. The law presumes, in the absence of clear and convincing evidence to the contrary, that the Patent and Trademark Office acted correctly in issuing the patent. Nevertheless, once the validity of a patent has been put in issue, it is the responsibility of the jury to review what the Patent and Trademark Office has done consistent with these instructions on the law.

³⁴ Affymetrix's proposed instruction is loosely based on the 2004 Draft Delaware Model Instructions, but alters the model instruction to add redundant and prejudicial language regarding the burden of proof, which is properly discussed in Instruction No. 1.3. Illumina's proposed instruction more closely follows the model instruction of the 2004 Draft Delaware Model Instructions than Affymetrix's.

5.3. DERIVATION [DISPUTED]³⁵

The patent laws require that the inventor on a patent be the true inventor of the invention covered by the patent claims. An inventor on a patent is not the true inventor if he “derived” the invention from someone else. An invention is said to be “derived” from another person if that other person conceived of claimed subject matter and communicated that conception to the inventor named on the patent. Conception of claimed subject matter occurs when the inventor has formed the idea of how to make and use every aspect of the claimed subject matter, and all that is required is that it be made, without the need for further inventive effort. Derivation may be of the claimed subject matter itself, or of an obvious variation of the subject matter.

If an inventor derived the patented invention from someone else, then the patent claims covering the invention are invalid.

In this case, Illumina contends that certain claims of the patents-in-suit are invalid because the inventor derived the invention of those claims from someone else. If you find that Illumina has proved that it is highly probable that the inventor of a patent-in-suit derived the invention covered by a claim then you must find that the claim is invalid.

³⁵ Affymetrix did not propose an instruction regarding derivation. The source for Illumina’s proposed instruction is the Federal Circuit Bar Association Model Patent Jury Instructions, § 10.7 (adapted).

5.4. ENABLEMENT [DISPUTED]³⁶

Illumina contends that certain claims of the patents-in-suit are invalid because the patent specification lacked an enabling disclosure.

Patent law requires that the disclosure or written description portion of a patent be sufficiently detailed to enable those skilled in the art to practice the full scope of the claimed invention. The purpose of this requirement is to ensure that the public, in exchange for the patent rights given to the inventor, obtains from the inventor a full disclosure of how to carry out the invention. The scope of the claims must be less than or equal to the scope of enablement.

To meet this requirement, the patent disclosure must allow a person of ordinary skill in the art to practice the full scope of the claimed invention without undue experimentation. Because descriptions in patents are addressed to those skilled in the art to which the claimed invention pertains, an applicant for a patent need not expressly include information that is commonly understood by persons skilled in the art. Similarly, a patent specification need not contain a working example so long as the patent discloses enough information to enable a person of ordinary skill in the art to practice the invention. The fact that some experimentation may be required for a skilled person to practice the claimed invention does not mean that the specification is not enabling.

Factors to be considered in determining whether a disclosure would require undue experimentation include: (1) the quantity of experimentation necessary; (2) the amount of direction or guidance disclosed in the patent; (3) the presence or absence of working examples

³⁶ Affymetrix's proposed instruction is based on the *Tristata* Final Jury Instructions, and includes language that is redundant and unnecessary. Illumina's instruction adopts the 2004 Draft Delaware Model Instructions, and incorporates the well-settled law that the patent specification must enable the "full scope" of the claims. *See, e.g., Invitrogen Corp. v. Clontech Labs., Inc.*, 429 F.3d 1052, 170-1 (Fed. Cir. 2005) ("Section 112 requires that the patent specification enable 'those skilled in the art to make and use the full scope of the claimed invention without 'undue experimentation.'").

in the patent; (4) the nature of the invention; (5) the state of the prior art; (6) the relative skill of those in the art; (7) the predictability or unpredictability of the art; and (8) the breadth of the claims.

5.5. WRITTEN DESCRIPTION [DISPUTED]³⁷

Illumina contends that certain claims of the patents-in-suit are invalid because they lack an adequate written description.

The patent law requires that a patent application contain an adequate written description of the invention to ensure that the inventor was in possession of the invention at the time the patent application was filed. The specification and claims as originally filed must convey to persons of ordinary skill in the art that the inventor had invented the subject matter that is spelled out in the claims that ultimately issued as a patent. The description must be sufficiently clear that persons of ordinary skill in the art will recognize that the applicant made the invention having each of the elements described in the claims.

An application satisfies the written description requirement if persons of ordinary skill in the art at the time the application was filed would recognize from the application that the inventor actually invented the full scope of the invention as finally claimed in the patent.

To meet the requirement of providing a description of the patented invention, the patent application must adequately describe the invention as it was finally claimed in the issued patent. That is, to prove a claim invalid for lack of an adequate written description, Illumina must prove by clear and convincing evidence that the patent application does not reasonably convey to a person of ordinary skill in the art that the inventors had possession of the full scope of the

³⁷ Affymetrix's proposed instruction omits language from the model instruction from the 2004 Draft Delaware Model Instructions, §4.2, on which it is based, and replaces it with incorrect and prejudicial statements of law, without any support for those statements. Illumina's proposed instruction removes the new language that Affymetrix proposes, and reinserts the omitted language, to more closely reflect the model instruction. Illumina also adapts the model instruction to reflect the holding of the Federal Circuit in *Chiron v. Genentech*, 363 F.3d 1247, 1259 (Fed. Cir. 2004) (endorsing the "full scope" jury instruction language proposed by Illumina and noting that, by providing this instruction, "the district court instructed the jury on the proper standard for the written description requirement.").

invention (at the time of the application) as that invention was finally claimed in the issued patent. No particular form of written description is required.

5.6. DEFINITENESS UNDER 35 U.S.C. § 112 [DISPUTED]³⁸

I will next discuss in more detail the standards by which the legal adequacy of a patent specification, both disclosure and claims, will be judged.

As previously mentioned the Patent Laws require the claims of a patent to be sufficiently definite that one skilled in the art can determine the precise limits of the claimed invention. If a claim is found to be indefinite the claim is invalid.

The amount of detail required to be included in claims depends on the particular invention and the prior art, and is not to be evaluated in the abstract but in conjunction with the disclosure. If the claims, read in light of the disclosure, reasonably apprise those skilled in the art of the proper scope of the invention, and if the language is as precise as the subject matter permits, then the claims are not indefinite.

Simply because some claim language may not be precise does not automatically render a claim invalid. When a word or phrase of degree such as ‘substantially equal to’ is used, we must determine whether the patent disclosure provides some standard for measuring that degree. One must then determine whether one of ordinary skill in the art would understand what is covered when the claim is read in light of the disclosure. Even if one needed to experiment so as to determine the limits of the claims of the patent, that would not necessarily be a basis for holding the claims invalid.

³⁸ Affymetrix proposes no instruction for Illumina’s indefiniteness defense. The source for Illumina’s instruction is the 1993 Delaware Uniform Instructions (adapted).

5.7. ANTICIPATION — GENERALLY [DISPUTED]³⁹

Illumina contends that the inventions covered by certain claims of the patents-in-suit are invalid because they are not new. A person cannot obtain a patent on an invention if someone else has already made the same invention. In other words, the invention must be new. If the invention is not new, we say that it was “anticipated” by prior art. Prior art is the legal term used to describe what others had done in the field before the invention was made, and may include things such as public use, presentations, posters, articles, books and other patents. It is not necessary that the prior art has been available to every member of the public. It must have been available, without restriction, to that segment of the public most likely to avail itself of the prior art’s contents.

An invention that is “anticipated” by the prior art is not entitled to patent protection. In order to prove that an invention is “anticipated,” Illumina must prove by clear and convincing evidence that a single piece of prior art describes or discloses all of the elements of the claimed invention.

In determining whether every one of the elements of the claimed invention is found in the prior publication, patent, etc., you should take into account what a person of ordinary skill in the art would have understood from his or her examination of the particular publication, patent, etc.

In determining whether the single item of prior art anticipates a patent claim, you should take into consideration not only what is expressly disclosed in the particular item of prior publication, patent, etc., but also what inherently occurred as a natural result of its practice. This

³⁹Affymetrix’s proposed instruction does not provide a provision for either the understanding of a person of ordinary skill in the art, or the issue of inherency, and thus is an incomplete statement of the law. The sources for Illumina’s proposed instruction are the 2004 Draft Delaware Model Instructions and the AIPLA Model Jury Instructions. In particular, Illumina’s instruction incorporates the language of the model instruction from the AIPLA Model Jury Instructions that addresses the understanding of a person of ordinary skill in the art and the issue of inherency. Furthermore, Affymetrix’s proposed instruction includes an incorrect statement of law as to Illumina’s burden of proof on these issues.

is called “inherency.” A party claiming inherency must prove it by clear and convincing evidence. To establish inherency, the evidence must make clear that the missing descriptive matter is necessarily present in the reference and that it would be so recognized by persons of ordinary skill in the art. Inherent anticipation, however, does not require that a person of ordinary skill in the art at the time would have recognized the inherent disclosure. Thus, the prior use of the patented invention that was accidental, or unrecognized and unappreciated can still be an invalidating anticipation.

You must keep these requirements in mind and apply them to each kind of anticipation you consider in this case. There are additional requirements that apply to the particular categories of anticipation that Illumina contends apply in this case. I will now instruct you about those.

5.8. DATE OF INVENTION [DISPUTED]⁴⁰

Certain categories of prior art refer to the date at which the inventor made the invention. This is called the “date of invention.”

Under the patent laws, the date of invention is generally the date that the patent application was filed. This is also referred to as a “constructive reduction to practice.” In this case, the date is [*to be completed for each patent*]. Ordinarily, art dated before the application filing date is prior art to the patent claims.

To prove a date of invention earlier than the filing date, Affymetrix must show that there was an earlier reduction to practice or an earlier conception followed by a diligent reduction to practice. Conception requires proof that the inventors formed in their minds a definite and permanent idea of the complete and operative invention and that the idea be so clearly defined in the inventors’ minds that only ordinary skill would be necessary to reduce the invention to practice, without extensive research or experimentation.

If Affymetrix seeks to show conception through oral testimony of the inventors, it must also produce independent evidence corroborating that testimony. Such evidence is to be evaluated under a rule of reason. Proof of an alleged inventor’s conception and reduction to practice requires full corroboration by other than the inventor’s own testimony or records. To prove actual reduction to practice of a method, an inventor must

⁴⁰Illumina’s proposed instruction adopts language that closely comports with the model instruction of the Federal Circuit Bar Association Model Patent Jury Instruction, §10.6.1, which recognizes that “Many of the different categories of prior art refer to the date at which the inventor made the invention.” In addition, Illumina’s adapts the model instruction to reflect the heavy burden and corroboration that is necessary to prove an alleged inventor’s conception and reduction to practice. See, e.g., *Aspex Eyewear, Inc. v. Revolution Eyewear Inc.*, No. CV99-1623LGB, 2001 WL 34852696, at * 5 (C.D. Cal., June 4, 2001) (“[P]roof of an alleged inventor’s conception and reduction to practice is a heavy one and requires full corroboration by other than the inventor’s own self-serving testimony or records.”).

establish that he actually performed the method and obtained the results. The inventor must also have contemporaneous recognition and appreciation of the invention represented by the claims.

X.7 PRIOR ART GENERALLY [DISPUTED]⁴¹

⁴¹ Affymetrix's proposed instruction for "Prior Art - Generally" is an incorrect and incomplete statement of law, and neither the 1993 Delaware Uniform Instructions nor the 2004 Draft Delaware Model Instructions include a similar instruction. Accordingly, Illumina objects to its inclusion. Specifically, Affymetrix's instruction does not recognize that a reference need not enable its own invention to anticipate a later invention. Instead, "[t]o serve as an anticipating reference, the reference must enable that which it is asserted to anticipate." *Elan Pharms., Inc. v. Mayo Found. for Med. Educ. & Research*, 346 F.3d 1051, 1054 (Fed. Cir. 2003).

5.9. PRIOR PUBLICATION [DISPUTED]⁴²

Illumina contends that certain claims of the patents-in-suit were anticipated because the invention defined in those claims was described in a prior publication, such as an article, book or another patent. A patent claim is anticipated and invalid if the entire invention defined by that claim was described in a printed publication either: (i) before Affymetrix made its invention; or (ii) more than one year before the effective filing date of Affymetrix's patent application.

For a printed publication to anticipate a claim of a patent-in-suit, Illumina must show that the printed publication, when read by a person of ordinary skill in the art, embodies or discloses each element of the claim. The disclosure must be complete enough to enable one of ordinary skill in the art to practice the claimed invention of the patent-in-suit, without undue experimentation. In determining whether the disclosure is enabling of the patent-in-suit, you should take into account what would have been within the knowledge of a person of ordinary skill in the art at the time, and you may consider expert testimony and other publications that shed light on the knowledge such a person would have had at that time.

⁴² Affymetrix's proposed instruction incorporates a redundant statement concerning Illumina's burden of proof. In addition, it contains an incorrect statement of law -- *i.e.*, if the entire invention defined by a patent claim is described in a patented publication either: (i) before Affymetrix made its invention; or (ii) more than one year before the effective filing date of Affymetrix's patent application, the patent claim *is* anticipated, not *may be* anticipated. See 35 U.S.C. § 102(c)(2) (stating that a patent claim is invalid by reason of anticipation if "the invention was described in . . . a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent."). The source for Illumina's proposed instruction is the 2004 Draft Delaware Model Instructions, which it adapts to remove redundant statements regarding Illumina's burden of proof and to correct the incorrect statement of the law regarding the anticipation standard.

5.10. PRIOR PUBLIC KNOWLEDGE [DISPUTED]⁴³

Illumina contends that certain claims of the patents-in-suit were anticipated because the invention defined in the patents-in-suit were publicly known or used by others in the United States before the date of invention.

A patent claim is invalid if the invention recited in that claim was publicly known or used by others in the United States before the patent applicant invented it. If you find that this is true, you must find the patent invalid.

⁴³ Affymetrix did not propose an instruction for prior public knowledge. The source for Illumina's proposed instruction is the 2004 Draft Delaware Model Instructions, § 4.5.1.

5.11. PRIOR PUBLIC USE [DISPUTED]⁴⁴

Illumina contends that certain of the claims of the patents-in-suit were anticipated because the invention defined in those claims were publicly used prior to *[to be completed for each patent.]*

The “public use” of a completed invention before *[to be completed for each patent]* invalidates the patent. An invention is publicly used when it is made accessible to any member of the public other than the inventor or a person under an obligation of secrecy imposed by the inventor. Thus, a patent is not invalidated if the particular device, composition or process is used by someone other than the inventor under circumstances where it is not made accessible to the public.

If the prior public use was an experimental use that was performed to perfect or complete the invention to determine that it will work for its intended purpose, that use will not invalidate the patent.

⁴⁴ Affymetrix did not propose an instruction for prior public use. The source for Illumina’s proposed instruction is the 2004 Draft Delaware Model Instructions, § 4.5.2.

5.11.1. PRIOR INVENTION [DISPUTED]⁴⁵

Illumina contends that the patents in suit are invalid because someone else invented the invention before the patentee did.

In the United States, a patent is awarded to the first inventor. A patent claim is invalid if: (i) the invention defined by that claim was invented by another person in the United States before it was invented by the patentee; and (ii) that other person did not abandon, suppress or conceal the invention.

A party abandons, suppresses or conceals the invention if, after reducing the invention to practice, the party unreasonably delays making the invention public, selling it or otherwise using it for a commercial purpose.

There is no particular length of delay that is per se unreasonable. You must decide whether, under the facts before you, any delay between the reduction to practice and public disclosure was reasonable or excused. In making this determination, you should consider the length of the delay period, the existence and nature of any activity during the delay period, or the lack of activity during the delay period. If there was a lack of activity, consider the cause of the resumption of activity.

As a general rule, the first person to reduce an invention to practice is said to be the first inventor. An invention is reduced to practice either when a patent application is filed with an enabling disclosure or when the invention is actually made and is shown to work for its intended purpose. Thus, if another person reduces to practice an invention before the inventor on the patent, then the invention reduced to practice by the other person generally will be prior art.

⁴⁵ Affymetrix did not propose an instruction for prior public use. The source for Illumina's proposed instruction is the 2004 Draft Delaware Model Instructions, § 4.5.3.

There is, however, an important exception to this general rule. Someone who was first to conceive of an invention but reduced it to practice after someone else will be the first inventor if he or she was the first to conceive of the invention and he or she exercised reasonable diligence in reducing the invention to practice from a time just before the other person's conception. Conception of an invention occurs when the inventor has formed a definite and permanent idea of how to make and use every aspect of the patented invention, and all that is required is that it be made, without the need for any further inventive effort. An idea is defined and permanent when the inventor has a specific, settled idea or a particular solution to the problem at hand, not just a general goal or research plan he hopes to pursue. Where a party seeks to show conception through oral testimony of an inventor, corroboration of this evidence is required.

5.12. PRIOR UNITED STATES APPLICATION [DISPUTED]⁴⁶

Illumina contends that certain claims of the patents-in-suit were anticipated because the invention defined in those claims was embodied in a prior patent application. A patent may be found invalid if the claimed invention was described in a patent granted on an application as filed by another in the United States before the invention was made by Affymetrix in the United States.

In order for the patents-in-suit to be anticipated by a prior United States patent application, Illumina must prove the following:

1. There is another patent that has inventors other than the named inventors;
2. The patent application for that other patent was filed in the United States before the invention of the patents-in-suit was made; and
3. That the other patent describes what the named inventor claimed in the patents-in-suit.

⁴⁶ Affymetrix did not propose an instruction for prior United States application. The source for Illumina's proposed instruction is the 2004 Draft Delaware Model Instructions, § 4.6.

5.13. OBVIOUSNESS [AGREED]⁴⁷

In order to be patentable, an invention must not be obvious to a person of ordinary skill in the art at the time the invention was made. The issue is not whether the claimed invention would be obvious to you as a layperson, to me as a judge, or to a genius in the art, but whether it would have been obvious to one of ordinary skill in the art at the time it was made.

To determine obviousness or non-obviousness of the claimed subject matter of each of the patents-in-suit, you should take the following steps:

1. Determine the scope and content of the prior art relied upon by Illumina.
2. Identify the difference, if any, between each claim of the patents-in-suit and the prior art.
3. Determine the level of ordinary skill in the pertinent art at the time the invention of the patent-in-suit was made.
4. Consider objective factors of non-obviousness, which I will describe to you in detail later.

Against this background, you must then decide whether the claimed subject matter would have been either obvious or non-obvious to a person of ordinary skill in the pertinent art.

⁴⁷ Source: Adapted from *Tristrata* Final Instructions; 2004 Draft Delaware Model Instructions. Illumina notes that the case of *Teleflex, Inc. v. KSR Int'l. Inc.* is on appeal before the Supreme Court and may significantly impact the standard for obviousness. Therefore Illumina reserves the right to object to jury instructions that do not reflect the standard for obviousness as ultimately articulated by the Supreme Court.

5.14. SCOPE AND CONTENT OF THE PRIOR ART [AGREED]⁴⁸

In arriving at your decision on the issue of whether or not the claimed invention is obvious to one of ordinary skill in the art, you must first determine the scope and content of the prior art. This means that you must determine what prior art is reasonably pertinent to the particular problem the inventor faced. Prior art is reasonably pertinent if it is in the same field as the claimed invention or is from another field that a person of ordinary skill would look to in trying to solve the problem the named inventor was trying to solve. Prior art includes the following:

1. Articles, books or any other type of printed publication publicly available before *[to be completed for each patent]*;
2. Patents that issued before *[to be completed for each patent]*;
3. Patents having a publication date before *[to be completed for each patent]*;
4. U.S. Patents that have a filing date prior to *[to be completed for each patent]*;
5. Anything in public use or on sale in the United States before *[to be completed for each patent]*;
6. Anything that was publicly known or used by others in this country before the date of invention of the patents-in-suit; and
7. Anything that was made or built or any process that was used in this country by another person before the date of invention of the patents-in-suit, where the thing made or built or the process used was not abandoned, suppressed or concealed.

⁴⁸ Source: *Tristrata* Final Instructions; 2004 Draft Delaware Model Instructions (adapted). Illumina notes that the case of *Teleflex, Inc. v. KSR Int'l. Inc.* is on appeal before the Supreme Court and may significantly impact the standard for obviousness. Therefore Illumina reserves the right to object to jury instructions that do not reflect the standard for obviousness as ultimately articulated by the Supreme Court.

5.15. DIFFERENCES OVER THE PRIOR ART [AGREED]⁴⁹

You must next consider the differences, if any, between the prior art and the claimed invention. Although it is proper for you to note any differences between the claimed invention and the prior art, you should not focus only on the differences, because the test is whether the claimed invention as a whole would have been obvious over all of the prior art. Each claim must be considered in its entirety.

⁴⁹ Source: *Tristrata* Final Instructions; 2004 Draft Delaware Model Instructions. Illumina notes that the case of *Teleflex, Inc. v. KSR Int'l. Inc.* is on appeal before the Supreme Court and may significantly impact the standard for obviousness. Therefore Illumina reserves the right to object to jury instructions that do not reflect the standard for obviousness as ultimately articulated by the Supreme Court.

5.16. LEVEL OF ORDINARY SKILL [AGREED]⁵⁰

Next, you are to determine the level of ordinary skill in the art to which the claimed invention pertains at the time the claimed invention was made. Factors to be considered in determining the level of ordinary skill in the pertinent art include the educational level of the inventor, the types of problems encountered in the art, the prior art patents and publications, the activities of others and prior art solutions to the problems encountered by the inventor, the sophistication of the technology, and the education of others working in the field.

⁵⁰ Source: *Tristrata* Final Instructions; 2004 Draft Delaware Model Instructions. Illumina notes that the case of *Teleflex, Inc. v. KSR Int'l. Inc.* is on appeal before the Supreme Court and may significantly impact the standard for obviousness. Therefore Illumina reserves the right to object to jury instructions that do not reflect the standard for obviousness as ultimately articulated by the Supreme Court.

5.17. MOTIVATION TO COMBINE [DISPUTED]⁵¹

Once the prior art is assembled and considered, you should determine whether the prior art, common knowledge, and common sense considered as a whole, suggests the claimed invention. Prior art references may be combined to show obviousness if there is some motivation or suggestion to combine the references and if the combination would be reasonably likely to achieve the goal of the invention.

The motivation need not be found in the references sought to be combined, but may be found in any number of sources, including common knowledge, the prior art as a whole, or the nature of the problem itself. There is no requirement that the prior art contain an express suggestion to combine known elements to achieve the claimed invention. Rather, the suggestion to combine may come from the prior art, as filtered through the knowledge of one skilled in the art. For example, where the combination results in a product or process that is more desirable, for example because it is stronger, cheaper, cleaner, faster, lighter, smaller, more durable, or more efficient and the improvement is technology-independent, an implicit motivation to

⁵¹ Source: 2004 Draft Delaware Model Instructions adapted to reflect the recent Federal Circuit holding in *Dystar Textilfarben GmbH & Co. Deutschland HG v. C.H. Patrick Co.*, 464 F.3d 1356, 1361 (Fed. Cir. 2006) (holding, “[t]he motivation need not be found in the references sought to be combined, but may be found in any number of sources, including common knowledge, the prior art as a whole, or the nature of the problem itself,” and that “there is no requirement that the prior art contain an express suggestion to combine known elements to achieve the claimed invention. Rather the suggestion to combine may come from the prior art, as filtered through the knowledge of one skilled in the art.”); *see also id.* at 1367 (holding, “[o]ur suggestion test is in actuality quite flexible and not only permits, but *requires*, consideration of common knowledge and common sense.”) (emphasis in original); *see also id.* at 1368 (holding “[i]ndeed we have repeatedly held that an implicit motivation to combine exists not only when a suggestion may be gleaned from the prior art as a whole, but when the ‘improvement’ is technology-independent and the combination of references results in a product or process that is more desirable, for example because it is stronger, cheaper, cleaner, faster, lighter, smaller, more durable, or more efficient. Because the desire to enhance commercial opportunities by improving a product or process is universal -- and even common-sensical -- we have held that there exists in these situations a motivation to combine prior art references even absent any hint of a suggestion in the references themselves. In such situations, the proper question is whether the ordinary artisan possesses knowledge and skills rendering him capable of combining the prior art references.”).

Illumina notes that the case of *Teleflex, Inc. v. KSR Int’l. Inc.* is on appeal before the Supreme Court and may significantly impact the standard for obviousness. Therefore Illumina reserves the right to object to jury instructions that do not reflect the standard for obviousness as ultimately articulated by the Supreme Court.

combine exists. In such situations, the proper question is whether the ordinary artisan possesses knowledge and skills rendering him capable of combining the prior art references.

5.14 HINDSIGHT [DISPUTED]⁵²

⁵² A separate instruction for hindsight is not necessary. The instruction of 5.17 sufficiently prevents the use of improper hindsight, and Illumina's proposed instruction addresses this issue.

X.16 OBVIOUS TO TRY [DISPUTED]⁵³

⁵³ Illumina objects to inclusion of this instruction both because it is unnecessary, and because it fails to define with particularity the “obvious to try” concept. *See Novo Nordisk A/S v. Becton Dickinson & Co.*, 304 F.3d 1216, 1219-20 (Fed. Cir. 2002) (affirming a district court’s refusal to include an instruction of “obvious to try” as proffered here).

5.18. [LEFT INTENTIONALLY BLANK]

5.19. OBJECTIVE CRITERIA CONCERNING OBVIOUSNESS [AGREED]⁵⁴

In making your decision as to the obviousness or non-obviousness of the claimed invention, you must consider the following objective evidence that may tend to show the non-obviousness of the claims at issue:

1. commercial success or lack of commercial success of products covered by the patents-in-suit;
2. a long-felt need in the art that was satisfied by the invention of the patents-in-suit;
3. the failure of others to make the invention;
4. copying of the invention by others in the field;
5. unexpected results achieved by the invention;
6. praise of the invention by the infringer or others in the field;
7. expressions of disbelief or skepticism by those skilled in the art upon learning of the invention;
8. whether the inventor proceeded in a direction contrary to the accepted wisdom of those skilled in the art; and
9. the taking of licenses under the patents by others.

However, there must be a connection between the evidence showing any of these factors and the claimed invention if this evidence is to be given weight by you in arriving at your conclusion on the obviousness issue. For example, if commercial success is due to advertising, promotion, salesmanship or the like, or is due to features of the product other than those claimed

⁵⁴ Source: *Tristrata* Final Instructions; 2004 Draft Delaware Model Instructions (adapted). Illumina notes that the case of *Teleflex, Inc. v. KSR Int'l. Inc.* is on appeal before the Supreme Court and may significantly impact the standard for obviousness. Therefore Illumina reserves the right to object to jury instructions that do not reflect the standard for obviousness as ultimately articulated by the Supreme Court.

in the patent-in-suit, then any commercial success may have no relation to the issue of obviousness.

6. INEQUITABLE CONDUCT

6.1. INEQUITABLE CONDUCT [DISPUTED]⁵⁵

Illumina asserts that Affymetrix obtained certain of the patents-in-suit through inequitable conduct and that Affymetrix may therefore not enforce these patent against Illumina because of this inequitable conduct.

Applicants are required to prosecute patent applications with candor, good faith, and honesty. This duty of candor and good faith extends to all inventors named on a patent application, all attorneys and agents involved in preparing and prosecuting the application, and every other person involved in a substantial way with the prosecution of the patent application. Each individual with such a duty must disclose all information known to that individual to be material.

This duty of candor is important because the examiner had only limited information available to determine the state of the art. The time available to the examiner is also limited. Therefore, to prevent an applicant from obtaining a patent he or she does not deserve, the Patent and Trademark Office requires full disclosure to the Patent and Trademark Office of all information which is material to examination of the application. This means that the applicant and his or her attorneys must not intentionally withhold or misrepresent material information concerning the claimed invention. A breach of this duty is called inequitable conduct and renders the patent unenforceable.

To prove that inequitable conduct occurred, Illumina must prove that it is highly probable that the patent applicant or the applicant's attorney or representative, intentionally withheld or

⁵⁵ Affymetrix did not propose an instruction for inequitable conduct. The sources for Illumina's proposed instruction are the 1993 Delaware Uniform Instructions and the AIPLA Model Instructions, Version 1.1, February 2006.

misrepresented information with an intent to mislead or deceive the Patent and Trademark Office.

Illumina bears the burden of establishing inequitable conduct by clear and convincing evidence. To determine whether a patent was obtained through inequitable conduct, you must determine that Affymetrix, its representative, or someone involved in a substantial way with the prosecution of the application withheld or misrepresented information that was material to the examination of the patent application, and that this individual or these individuals acted with an intent to deceive or mislead the Patent and Trademark Office.

6.2. MATERIALITY [DISPUTED]⁵⁶

Illumina contends that [list the art] was material information known to the applicant, the applicant's representative, or someone else involved in a substantial way in the prosecution of the application and was withheld or misrepresented to the Patent and Trademark Office during the prosecution of the [list the patents]. If you find that the applicant, the applicant's representative, or other individuals misrepresented information when applying for the [list the patent[s]], you must determine whether that information was material.

Information is material if there is a substantial likelihood that a reasonable patent examiner would consider it important in deciding whether or not to allow the application to issue as a patent. Information is also material where it establishes, by itself or in combination with other information, a prima facie case of unpatentability of a claim. Finally information is also material if it refutes, or is inconsistent with, a position the applicant takes in opposing an argument of unpatentability by the Patent and Trademark Office or in asserting patentability. A withheld reference may be highly material when it discloses a more complete combination of relevant features, even if those features are before the patent examiner in other references.

If you determine that there was a withholding or misrepresentation of information and that the information was material, then you must consider the element of intent. If, on the other hand, you find that the applicants have failed to prove by clear and convincing evidence that

⁵⁶ Affymetrix did not propose an instruction for materiality. The sources for Illumina's proposed instruction are the 1993 Delaware Uniform Instructions and the AIPLA Model Instructions, Version 1.1, February 2006. Illumina has modified these model instructions to accurately reflect Federal Circuit precedent as provided in the following cases: *Digital Control Inc. v. The Charles Machine Works*, 437 F.3d 1309, 1314-6 (Fed. Cir. 2006) (holding that information is material to patentability where it is not cumulative to information already of record and "it establishes by itself or in combination with other information, a prima facie case of unpatentability of a claim; or ... [i]t refutes, or is inconsistent with, a position the applicant takes in: [o]pposing an argument of unpatentability relied on by the Office, or [a]sserting an argument of patentability"). *Semiconductor Energy Laboratory Co., v. Samsung Electronics Co.*, 204 F.3d 1368, 1374 (Fed. Cir. 2000) (holding that a withheld reference may be highly material when it discloses a more complete combination of relevant features, even if those features are before the patent examiner in other references.).

applicants or their attorneys withheld or misrepresented any material information, then you must find that there was no inequitable conduct.

6.3. INTENT [DISPUTED]⁵⁷

Illumina contends that material information was withheld or misrepresented to the Patent and Trademark Office during the prosecution of the patents-in-suit with the intent to deceive or mislead the Patent and Trademark Office. If you determine that material information was withheld or misrepresented to the Patent and Trademark Office, you must next determine whether such information was withheld or misrepresented with the intent to deceive or mislead the Patent and Trademark Office. Intent to deceive the Patent and Trademark Office may be found from direct evidence. Such direct evidence is rare, however, and as a result, the law allows deceptive intent to be inferred from the facts and surrounding circumstances.

In determining whether or not there was intent to deceive or mislead the Patent and Trademark Office, you should consider the totality of the circumstances, including the nature of the conduct and evidence of the absence or presence of good faith. The fact of misrepresentation, coupled with proof that the party making it had knowledge of its falsity, is enough to warrant drawing the inference that there was a fraudulent intent.

⁵⁷ Affymetrix did not propose an instruction for intent. The source for Illumina's proposed instruction is the AIPLA Model Instructions, Version 1.1, February 2006. Illumina has adapted the model instruction to reflect the holding of *Lipman v. Dickinson*, 174 F.3d 1363, 1370 (Fed. Cir. 1999).

6.4. BALANCING OF MATERIALITY AND INTENT [DISPUTED]⁵⁸

If you determine that Illumina has proven by clear and convincing evidence that material information was withheld or misrepresented and that there was an intent to deceive or mislead the Patent and Trademark Office, you must then balance the degree of materiality and the degree of intent to determine whether or not the evidence is sufficient to establish clearly and convincingly that there was inequitable conduct committed in the prosecution of any or all of the patents-in-suit. Where the materiality of the withheld or misrepresented information is high, the showing of intent needed to establish inequitable conduct is proportionally less.

⁵⁸ Affymetrix did not propose an instruction for the balancing of materiality and intent. The source for Illumina's proposed instruction is the AIPLA Model Instructions, Version 1.1, February 2006.

7. PATENT DAMAGES⁵⁹

7.1. COMPENSATORY DAMAGES IN GENERAL [DISPUTED]⁶⁰

If, after considering all of the evidence and the law as I have stated it, you have determined that each of the asserted claims is either not infringed, is invalid or is unenforceable, your verdict should be for Illumina and you need go no further in your deliberations. On the other hand, if you decide that one or more of the claims of the patents-in-suit are valid, enforceable and have been infringed by Illumina, you must then turn to the issue of damages.

The patent laws provide that in the case of infringement of a valid and enforceable patent claim, the owner of the patent shall be awarded damages adequate to compensate for the infringement, but in no event less than a reasonable royalty for the use made of the invention by the infringer. Damages are compensation for all losses suffered as a result of the infringement.

It is not relevant to the question of damages whether Illumina benefited from, realized profits from, or even lost money as a result of the acts of infringement. The only issue is the amount necessary to adequately compensate Affymetrix for Illumina's infringement.

⁵⁹ Contrary to the structure of Affymetrix's proposed instructions, the jury instructions regarding invalidity should be provided before the damages instructions, which is consistent with both the 1993 Delaware Uniform Instructions and the 2004 Draft Delaware Model Instructions.

⁶⁰ Affymetrix's proposed instruction does not address the impact of a finding of invalidity or unenforceability on this instruction and fails to include the model instruction's statement as to the relevant evidence for the jury to consider. The source for Illumina's proposed instruction is the 1993 Delaware Uniform Instructions, which it has adapted to reflect the facts of this case and to eliminate redundancy.

7.2. BURDEN OF PROOF — REASONABLE CERTAINTY [DISPUTED]⁶¹

Affymetrix has the burden of proving damages by a preponderance of the evidence and is entitled to all damages that can be proven with reasonable certainty. On the one hand, reasonable certainty does not require proof of damages with mathematical precision. Mere difficulty in ascertaining damages is not fatal to Affymetrix. On the other hand, Affymetrix is not entitled to speculative damages; that is, you should not award any amount of loss that, although possible, is wholly remote or the result of mere conjecture. You may base your evaluation of reasonable certainty on opinion evidence.

⁶¹Affymetrix's proposed instruction includes redundant language regarding the clear and convincing standard. This proposed language is not part of the model instruction on which Affymetrix's proposed instruction is based. The clear-and-convincing standard is clearly defined, and is properly incorporated, in the general burden of proof instruction (Instruction 1.3) where it is first introduced to the jury. Illumina's proposed instruction is based on the 2004 Draft Delaware Model Instruction §5.3 but does not include the unnecessary language that Affymetrix proposes. In addition, Illumina adapts the model instruction to remove a statement that is both prejudicial and an incomplete statement of law. Specifically, Illumina removes the statement relating to doubts as to damages being resolved against the alleged infringer because it is imprecise and could be construed in a manner that is inconsistent with Federal Circuit precedent on this issue.

7.3. DATE DAMAGES MAY BEGIN — MARKING [DISPUTED]⁶²

The date that Affymetrix first gave notice to Illumina of its claim of patent infringement is the date at which patent damages begin to be calculated. That date is in dispute here, and it is up to you to determine what that date is. Affymetrix has the burden to prove by a preponderance of the evidence the date it gave notice.

Affymetrix can give notice in two ways. The first way is to give notice to the public in general. Affymetrix can do this by placing the word “patent” or the abbreviation “PAT” with the number of the patent on substantially all the products it sold that included the patented invention. This type of notice is effective from the date Affymetrix and its licensees began to mark substantially all of their products that use the patented invention with the patent number. If Affymetrix and its licensees did not mark substantially all of their products that use the patented invention with the patent number, then Affymetrix did not provide notice in this way.

A second way Affymetrix can provide notice of its patents is to communicate to Illumina a specific charge that the allegedly infringing product infringed a specific patent. This type of notice is effective from the time it is given. If you find that Affymetrix, before filing this lawsuit, did not properly mark its products and did not notify Illumina by communicating a specific charge that the allegedly infringing products infringed, then Affymetrix can only recover damages for infringement that occurred after it sued Illumina on July 26, 2004.

⁶² Affymetrix did not propose an instruction regarding marking. The source for Illumina’s proposed instruction is the AIPLA Model Instructions, Version 1.1, February 2006.

7.4. METHODS FOR COMPUTING DAMAGES [DISPUTED]⁶³

There are two common methods for computing damages in a patent infringement case. One is called “lost profits,” and the other is called “reasonable royalty.” These are alternative methods for computing damages; you must award either lost profits or a reasonable royalty for each infringing sale made by the accused infringer. You cannot, however, award both lost profits and a reasonable royalty for the same sale.

In this case, Affymetrix is seeking lost profits as its patent damages for some of Illumina’s sales. Lost profits are the profits Affymetrix asserts it lost because of the infringement. They are not the profits Illumina actually made, rather Affymetrix seeks lost profits as a result of alleged lost sales.

In this case, Affymetrix must establish that the infringement caused the asserted lost profits. Thus, Affymetrix must show that “but for” the infringement, Affymetrix would have made the sales or profits that were allegedly lost.

⁶³ Affymetrix’s proposed instruction unnecessarily includes language that is not included in the model instructions on which it is based. In addition, Affymetrix’s instruction includes an instruction for lost profits due to price erosion, which is not at issue in this case. The source for Illumina’s proposed instruction is the 2004 Draft Delaware Model Instructions, §§ 5.2, 5.7 which is adapted to reflect the facts of this case.

7.5. LOST PROFITS — LOST SALES [DISPUTED]⁶⁴

Affymetrix is claiming that it lost sales because of Illumina's alleged infringement. In order to recover lost profits damages for lost sales, Affymetrix must show:

- (1) there was a demand for the patented product;
- (2) Affymetrix had the ability to meet the market demand;
- (3) no acceptable non-infringing substitutes were available; and
- (4) the amount of the profit it would have made.

Affymetrix need not negate every possibility that purchasers of Illumina's products might have bought another product. To be an acceptable non-infringing substitute, a proposed competitive substitute must have been acceptable to the actual purchasers of the infringing products.

In proving its damages, Affymetrix's burden of proof is not an absolute one, but rather a burden of reasonable probability. If it is reasonably probable that Affymetrix would have made some of the infringing sales, and it is reasonably probable what amount Affymetrix would have profited from the denied sales, then Illumina is liable for the lost profits on those infringing sales. The infringer is not liable, however, for speculative profits.

⁶⁴ Affymetrix's proposed instruction modifies the model instruction on which it is based, and contains an incomplete statement of the law as purportedly taken from the holding of *State Indus., Inc. v. Mor-Flo Indus., Inc.*, 883 F.2d 1573 (Fed. Cir. 1989). The source for Illumina's proposed instruction is the 2004 Draft Delaware Model Instructions. To the extent that an instruction is necessary relating to the market apportionment theory of *Mor-Flo*, Illumina proposes a separate jury instruction, such as §12.9 of the AIPLA's Model Patent Jury Instructions.

7.6. LOST PROFITS — PANDUIT FACTORS — DEMAND [DISPUTED]⁶⁵

Demand for the patented product can be proven by significant sales of Affymetrix's products, if any, covered by the patents. Demand for the patented product can also be proven by significant sales of Illumina's products, if any, containing the patented features. However, if you find Illumina generated new or different markets by sales efforts or by creating demand because of features other than the patented features, the sales of Illumina's product cannot establish a demand for the patented product.

To establish demand, Affymetrix must demonstrate that demand for Affymetrix's product and Illumina's product is interchangeable. In other words, the products must be sufficiently similar in terms of price, product characteristics and marketing channels to compete for the same customers. Affymetrix must show that the accused products do not have a disparately different price than or possess characteristics significantly different from Affymetrix's product.

⁶⁵ Affymetrix did not propose an instruction as to the individual *Panduit* factors. The source for Illumina's proposed instruction is the AIPLA Model Instructions, Version 1.1, February 2006, which Illumina has adapted to reflect the holdings of the following cases: *Crystal Semiconductor Corp. v. Tritech Microelectronics Int'l Inc.*, 246 F.3d 1336, 1356 (Fed. Cir. 2001) (holding that "a patentee must show that the infringing units do not have a disparately higher price than or possess characteristics significantly different from the patented product"); *Biacore, A.B. v. Thermo Bioanalysis Corp.*, 79 F. Supp. 2d 422, 469 (D. Del. 1999) (noting that *Panduit's* first factor "presupposes that demand for the patentee's product and the infringer's product is interchangeable."); *Comair Rotron, Inc. v. Nippon Densan Corp.*, 49 F.3d 1535, 1540 (Fed. Cir. 1995) ("if the products are not sufficiently similar -- in terms of price, product characteristics, and marketing channels -- to compete for the same customers, the infringing customers will not necessarily transfer their demand to the patentee's product in the absence of the infringing product.").

**7.7. LOST PROFITS — PANDUIT FACTORS — ACCEPTABLE
NON-INFRINGEMENT SUBSTITUTES [DISPUTED]⁶⁶**

In determining whether Affymetrix lost sales due to infringement, you must consider whether or not, if Illumina's accused products were not available, some or all of the people who bought from Illumina would have bought a different, non-infringing product from Illumina or from somebody else, rather than buy from Affymetrix. In that regard, you should consider a product sold by one of Affymetrix's licensees to be a non-infringing product.

In deciding whether or not people who bought from Illumina would have bought a non-infringing product, you should consider whether or not there was such a demand for the patented aspects of the infringing product that purchasers would not have bought a non-infringing product.

⁶⁶ Affymetrix did not propose an instruction as to the individual *Panduit* factors. The source for Illumina's proposed instruction is Federal Circuit Bar Association Model Patent Jury Instructions, §12.3.3.

7.8. LOST PROFITS — PANDUIT FACTORS — CAPACITY [DISPUTED]⁶⁷

Affymetrix is only entitled to lost profits for sales it could have actually made. You should consider whether Affymetrix has proven that it had the manufacturing capacity and the marketing capability to make the sales it says it lost. Affymetrix must prove that it was more probable than not that it could have made, or could have had someone else make for it, the additional products it says it could have sold but for the infringement. Affymetrix also must prove that it had the capability to market and sell the additional patented products.

⁶⁷ Affymetrix did not propose an instruction as to the individual *Panduit* factors. The source for Illumina's proposed instruction is the AIPLA Model Instructions, Version 1.1, February 2006.

7.9. AMOUNT OF LOST PROFITS [DISPUTED]⁶⁸

If Affymetrix has proved that it lost profits due to infringement by Illumina, then you are to find the amount of profits that Affymetrix lost. Affymetrix must prove the amount of its lost profits to a reasonable probability. The amount of lost profits damages should not include amounts that are merely speculation.

⁶⁸ Affymetrix did not propose an instruction as to the amount of lost profits. The source for Illumina's proposed instruction is the Federal Circuit Bar Association Model Patent Jury Instructions, § 12.3.5.

7.X LOST PROFITS - PRICE EROSION [DISPUTED]⁶⁹

⁶⁹ Section 7.10 in Affymetrix's proposed jury instructions is "Lost Profits - Price Erosion." At this point, it is Illumina's contention that price erosion is not at issue in this case. To the extent that price erosion is at issue, Illumina reserves the right to submit a jury instruction that more accurately reflects the law than Affymetrix's instruction.

7.10. REASONABLE ROYALTY [DISPUTED]⁷⁰

In this case, Affymetrix also seeks damages in the amount of a reasonable royalty. A royalty is an amount of money that someone pays a patent owner to be able to use the patented invention. A reasonable royalty is the minimum permissible measure of damages set by the patent laws and is not necessarily the actual measure of damages.

A reasonable royalty is the amount of money that would be agreed to in a hypothetical arm's-length negotiation between Affymetrix and Illumina, with both operating under the assumption that the negotiated patents are valid and would be infringed by the accused products or methods of using the products.

The reasonable royalty must be calculated as of the point in time just prior to when infringement began.

In the hypothetical arm's-length negotiation, you must assume that both parties are willing participants. You must assume that the person negotiating on behalf of Illumina was willing to take a license and would have known that the asserted claim or claims were valid, enforceable and infringed by Illumina. You must also assume that Affymetrix would have been willing to grant a license. Finally, you must assume that both Affymetrix and Illumina knew all pertinent information at the time of the hypothetical negotiations.

Having that in mind, you may consider any relevant fact in determining the reasonable royalty for Illumina's use of the patented invention, including the opinion testimony of experts.

⁷⁰ Affymetrix's proposed instruction omits language that is part of the 2004 Draft Delaware Model Instructions, such as language reflecting that the hypothetical negotiation involves willing participants and that Affymetrix would have been willing to grant a license in the hypothetical negotiation. Illumina's proposed instruction follows the 2004 Draft Delaware Model Instructions, but adapts it to the specific facts of this case and eliminates redundant language.

**7.11. FACTORS FOR DETERMINING REASONABLE ROYALTY
[AGREED]⁷¹**

In determining such a reasonable royalty, some of the factors that may be considered are:

1. the royalties received by Affymetrix for licensing others under the patents-in-suit;
2. the rates paid by Affymetrix, Illumina, or others for the use of other patents comparable to the patent in suit;
3. the nature and scope of the license, as exclusive or nonexclusive; or as restricted or nonrestricted in terms of territory or with respect to whom the manufactured product may be sold;
4. Affymetrix's established policy and marketing program to maintain its patent exclusivity by not licensing others to use the invention or by granting licenses under special conditions designed to preserve that exclusivity;
5. the commercial relationship between Affymetrix and Illumina, such as, whether they are competitors in the same territory in the same line of business, or whether they are inventors or promoters;
6. the effect of selling the patented specialty in promoting sales of other products of the licensee, the existing value of the invention to the licensor as a generator or sales of his non-patented items, and the extent of such derivative or convoyed sales;
7. the duration of the patents and the terms of the licenses;
8. the established profitability of the products made under the patents, their commercial success, and their current popularity;

⁷¹ Source: 2004 Draft Delaware Model Instructions.

9. the utility and advantages of Affymetrix's patented inventions over the old modes or devices, if any, that had been used for working out similar results;
10. the nature of the patented invention, the character of the commercial embodiments of it as owned and produced by Affymetrix, and the benefits to those who have used the invention;
11. the extent to which Illumina has made use of the invention, and any evidence that shows the value of that use;
12. the portion of the profit or of the selling price that may be customary in the particular business or in comparable businesses to allow for the use of the invention or analogous inventions;
13. the portion of the realizable profit that should be credited to the invention as distinguished from non-patented elements, the manufacturing process, business risks, or significant features or improvements added by Illumina;
14. the opinion testimony of qualified experts; and
15. any other economic factor that a normally prudent businessman would, under similar circumstances, take into consideration in negotiating the hypothetical license.

7.12. INTEREST [AGREED]⁷²

Neither of the parties' calculations include interest. Therefore, in arriving at your damages calculation, you should not consider interest in any way because it is the function of the Court to award or deny interest.

⁷²Source: *Power Integrations* Final Instructions; 2004 Draft Delaware Model Instructions.

7.13. CLOSING STATEMENT — DAMAGES [AGREED]⁷³

In determining the issue of a damages award, the Court instructs you that the law does not permit an award of a greater sum than the monetary loss which Affymetrix has suffered as a result of the alleged infringement. If you find Affymetrix is entitled to damages you may not include and/or add to the award any sum for purposes of punishing Illumina or to set an example.

⁷³Source: *Power Integrations* Final Instructions; 2004 Draft Delaware Model Instructions.

7.14. CURATIVE INSTRUCTION [AGREED]⁷⁴

The fact that I have instructed you regarding damages should not be construed as suggesting which party is to prevail in this case. Instructions regarding damages are given for your guidance in the event that the evidence leads you to find in favor of Affymetrix.

⁷⁴Source: *Power Integrations* Final Instructions; 2004 Draft Delaware Model Instructions.

8. UNFAIR COMPETITION AND TORTIOUS INTERFERENCE CLAIMS⁷⁵

I will now instruct you regarding the actions for unfair competition and intentional interference with contractual and prospective business relations. As I instructed you previously, Illumina alleges that Affymetrix has engaged in unfair competition and as a result, Illumina has suffered, and will continue to suffer, monetary and other damages.

⁷⁵ Affymetrix did not propose an introduction for Illumina's unfair competition and tortious interference counterclaims.

8.1. UNFAIR COMPETITION - GENERALLY [DISPUTED]⁷⁶

Illumina has brought a claim against Affymetrix for unfair competition. This claim prohibits wrongful business activity. It is not necessary for Illumina to show that Affymetrix intended to harm anyone by its actions, or that Illumina was damaged by Affymetrix's conduct, in order to prove a claim of unfair competition.

In order to establish a claim of unfair competition, Illumina must show, by a preponderance of the evidence, that Affymetrix committed at least one of the following:

1. an unlawful business act or practice;
2. an unfair business act or practice;
3. a fraudulent business act or practice; or
4. unfair, deceptive, untrue or misleading advertising.

A business practice is unlawful if it violates any federal, state, statutory or court-made law. A business practice is unfair if the act significantly threatens or harms competition and competitors. An "unfair act" does not need to be deceptive or unlawful. A business practice is fraudulent if the act is likely to deceive the public. Illumina does not need to show that Affymetrix intended to deceive the public, that any member of the public actually was deceived, that anyone relied on Affymetrix' conduct, or that Illumina was damaged by Affymetrix's conduct, in order to prove that Affymetrix's conduct was fraudulent.

⁷⁶ Affymetrix did not propose an instruction for the unfair competition claims under California Business Code § 17200 *et seq.* Illumina's proposed instruction is based on the following sources: Cal. Bus. & Prof. Code §17200; *Community Assisting Recovery, Inc. v. Aegis Ins. Co.*, 92 Cal. App. 4th 886, 891 (Cal. Ct. App. 2001) ("The statute imposes strict liability. It is not necessary to show that the defendant intended to injure anyone."); *Cel-Tech Communications, Inc. v. Los Angeles Cellular Telephone Co.*, 20 Cal. 4th 163 (Cal. 1999); *Day v. AT&T Corp.*, 63 Cal. App. 4th 325, 332 (Cal. Ct. App. 1998); *Saunders v. Superior Ct. of Los Angeles Cty.*, 27 Cal. App. 4th 832, 838-9 (Cal. Ct. App. 1994).

**8.2. INTENTIONAL INTERFERENCE WITH CONTRACTUAL RELATIONS
[DISPUTED]⁷⁷**

Illumina claims that Affymetrix intentionally interfered with Illumina's existing contractual relations. To establish this claim, Illumina must prove all of the following:

1. There was an existing contract;
2. Affymetrix knew of the contract;
3. Affymetrix intended to disrupt the performance of this contract;
4. Affymetrix' conduct prevented performance or made performance more expensive or difficult;
5. Illumina was harmed; and
6. Affymetrix's conduct was a substantial factor in causing Illumina's harm.

⁷⁷ Affymetrix did not propose an instruction for intentional interference with contractual relations. The source for Illumina's proposed instruction is the Judicial Counsel of California, Civil Jury Instructions (2006), § 2201.

**8.3. INTENTIONAL INTERFERENCE WITH PROSPECTIVE RELATIONS
[DISPUTED]⁷⁸**

Illumina claims that Affymetrix intentionally interfered with an economic relationship that probably would have resulted in an economic benefit to Illumina. To establish this claim, Illumina must prove all of the following:

1. An economic relationship existed that probably would have resulted in an economic benefit to Illumina;
2. Affymetrix knew of the relationship;
3. Affymetrix intended to disrupt the relationship;
4. Affymetrix engaged in wrongful conduct through, among other things, fraud, misrepresentations, wrongful business activities and anticompetitive behavior;
5. The relationship was disrupted;
6. Illumina was harmed; and
7. Affymetrix' wrongful conduct was a substantial factor in causing Illumina's harm.

⁷⁸ Affymetrix's proposed instruction improperly characterizes and limits the grounds upon which Affymetrix's conduct can be shown to be wrongful. The source for Illumina's proposed instruction is the Judicial Counsel of California, Civil Jury Instructions (2006), § 2202

8.4. PRIVILEGE OF COMPETITION [AGREED]

Ordinarily, a person who engages in business with the primary aim of making profits for himself or herself is not liable for business losses suffered by a competitor. The privilege of competition is an affirmative defense to a claim of interference with prospective economic advantage.

The essential elements of the privilege of competition are:

1. Illumina and Affymetrix were engaged in economic competition;
2. The economic relationship between Illumina and the third party concerns a matter involved in the competition between Illumina and Affymetrix;
3. Affymetrix did not use wrongful means;
4. Affymetrix's purpose was at least in part to advance its interest in competing with Illumina; and
5. Affymetrix's actions did not create or continue an unlawful restraint of trade.

8.5. WRONGFUL CONDUCT/MEANS [DISPUTED]⁷⁹

Wrongful conduct or wrongful means is conduct that is wrongful separate and apart from the fact that the conduct interfered with or disrupted the economic relationship between Affymetrix and Illumina.

⁷⁹ Affymetrix's proposed instruction mischaracterizes and improperly seek to limit the grounds upon which Affymetrix's conduct can be shown to be wrongful. Accordingly, in its instruction, Illumina does not include those paragraphs in which the grounds upon which Affymetrix's conduct can be shown to be wrongful are discussed. The source for the proposed instruction is the California Civil Jury Instructions (BAJI), 2006 ed., §7.86.1

XX.3 PRIVILEGE OF FREE COMPETITION [DISPUTED]⁸⁰

⁸⁰ Affymetrix' proposed instruction is not based on any model instruction or final jury instruction and is not supported by any holding of the case it cites, *San Francisco Design Center Assoc. v. The Portman Co.*, 41 Cal. App. 4th 29 (1995). This instruction should not be included because, to the extent it instructs on applicable law, it is redundant of Affymetrix's proposed instruction for "Privilege of Competition."

XX.5-16 WRONGFUL CONDUCT: VIOLATION OF SECTION 2 OF THE SHERMAN ACT, GENERALLY: NATURE OF THE CLAIM [DISPUTED]⁸¹

⁸¹ Affymetrix includes separate instructions for the Sherman Act (*i.e.*, XX.5 through 16). It is Illumina's position that such instructions are not necessary. To the extent that the Court believes that such instructions are necessary, Illumina does not object to inclusion of the instructions in the general format that Affymetrix proposes. Illumina, however, does object to Affymetrix's proposed instructions to the extent that they mischaracterize Illumina's claims and allegations relating to Affymetrix's violation of Section 2 of the Sherman Act. As one example, Illumina disputes Affymetrix's characterization of the relevant markets as recited in Affymetrix's proposed instructions. Accordingly, if the Court deems that instructions regarding Section 2 of the Sherman Act are appropriate, Illumina requests the opportunity to submit instructions that define accurately Illumina's claims and allegations in that regard.

8.6. CALIFORNIA BUSINESS CODE 17.200 - RESTITUTION [DISPUTED]⁸²

If you find that Affymetrix has engaged in conduct that supports a claim of unfair competition, Illumina is entitled to recover from Affymetrix the value that Affymetrix took directly from Illumina or that Illumina had a vested interest in. Illumina does not need to prove actual damage in order to obtain restitution from Affymetrix for its unfair competition.

⁸² Affymetrix did not propose an instruction for restitution. The sources for Illumina's proposed instruction are the following: Cal. Bus. & Prof. §17203; *ABC Int'l Traders, Inc. v. Matsushita*, 14 Cal. 4th 1247, 1270-71 (1997); *People v. Thomas Shelton Powers, M.D, Inc.*, 2 Cal. App. 4th 330, 342-3 (1st Dist. 1992)..

8.7. TORTIOUS INTERFERENCE DAMAGES [DISPUTED]⁸³

If you decide that Illumina has proven by a preponderance of the evidence that Affymetrix intentionally interfered with Illumina's contractual relations or prospective business relations under the law as I have explained it to you, you also must decide how much money will reasonably compensate Illumina for the harm.

The amount of damages must include an award for each item of harm that was caused by Affymetrix's wrongful conduct, even if the particular harm could not have been anticipated.

Illumina does not have to prove the exact amount of damages that will provide reasonable compensation for the harm. However, you must not speculate or guess in awarding damages.

⁸³ Affymetrix did not propose an instruction for damages for tortious interference. The source for Illumina's proposed instruction is the Judicial Counsel of California, Civil Jury Instructions (2006).

8.8. PUNITIVE DAMAGES [DISPUTED]⁸⁴

If you find that Affymetrix intentionally interfered with contractual or prospective business relations, you must decide whether that conduct justifies an award of punitive damages. The purposes of punitive damages are to punish a wrongdoer for the conduct that harmed the plaintiff and to discourage similar conduct in the future.

You may award punitive damages against Affymetrix only if Illumina has proven by clear and convincing evidence that Affymetrix engaged in that conduct with malice, oppression, or fraud. Malice means that Affymetrix acted with intent to cause injury or that Affymetrix's conduct was despicable and was done with a willful and knowing disregard of the rights or safety of another. A person acts with knowing disregard when he or she is aware of the probable dangerous consequences of his or her conduct and deliberately fails to avoid those consequences.

"Oppression" means that Affymetrix's conduct was despicable and subjected Illumina to cruel and unjust hardship in knowing disregard of its rights.

Despicable conduct is conduct that is so vile, base, or contemptible that it would be looked down on and despised by reasonable people.

Fraud means that Affymetrix intentionally misrepresented or concealed a material fact and did so intending to harm Illumina.

⁸⁴ Affymetrix did not propose an instruction for punitive damages for tortious interference. The source for Illumina's proposed instruction is the Judicial Counsel of California, Civil Jury Instructions, § 3945

8.9. AMOUNT OF PUNITIVE DAMAGES [DISPUTED]⁸⁵

There is no fixed standard for determining the amount of punitive damages, and you are not required to award any punitive damages. If you decide to award punitive damages, you should consider all of the following in determining the amount:

1. How reprehensible Affymetrix's conduct was. In deciding how reprehensible Affymetrix's conduct was, you may consider, among other factors:
 1. Whether Illumina was financially weak or vulnerable and Affymetrix knew Illumina was financially weak or vulnerable;
 2. Whether Affymetrix's conduct involved a pattern or practice; and
 3. Whether Affymetrix acted with trickery or deceit;
2. Whether there is a reasonable relationship between the amount of punitive damages and Illumina's harm or between the amount of punitive damages and potential harm that Affymetrix knew was likely to occur because of its conduct; and
3. In view of Affymetrix's financial condition, what amount is necessary to punish it and discourage future wrongful conduct.

⁸⁵ Affymetrix did not propose an instruction for the amount of punitive damages for tortious interference. The source for Illumina's proposed instruction is the Judicial Counsel of California, Civil Jury Instructions, § 3945.

9. DELIBERATION AND VERDICT

9.1. INTRODUCTION [AGREED]⁸⁶

That concludes the part of my instructions explaining the rules for considering some of the testimony and evidence. Now let me finish up by explaining some things about your deliberations in the jury room, and your possible verdicts.

Once you start deliberating, do not talk to the jury officer, or to me, or to anyone else except each other about the case. If you have any questions or messages, you must write them down on a piece of paper, sign them, and then give them to the jury officer. The officer will give them to me, and I will respond as soon as I can. I may have to talk to the lawyers about what you have asked, so it may take some time to get back to you. Any questions or messages normally should be sent to me through your foreperson, who by custom of this Court is Juror No. I.

One more thing about messages. Do not ever write down or tell anyone how you stand on your votes. For example, do not write down or tell anyone that you are split 4-4, or 6-2, or whatever your vote happens to be. That should stay secret until you are finished.

⁸⁶Source: *Power Integrations* Final Instructions; Delaware Uniform Instructions.

9.2. UNANIMOUS VERDICT [AGREED]⁸⁷

Your verdict must represent the considered judgment of each juror. In order for you as a jury to return a verdict, it is necessary that each juror agree to the verdict. Your verdict must be unanimous.

It is your duty, as jurors, to consult with one another and to deliberate with a view towards reaching an agreement, if you can do so without violence to your individual judgment. Each of you must decide the case for yourself, but do so only after an impartial consideration of the evidence with your fellow jurors. In the course of your deliberations, do not hesitate to reexamine your own views and change your opinion, if you become convinced it is erroneous. But do not surrender your honest conviction as to the weight or effect of evidence solely because of the opinion of your fellow jurors, or for the purpose of returning a verdict. Remember at all times that you are not partisans. You are judges — judges of the facts. Your sole interest is to seek the truth from the evidence in the case.

A form of verdict has been prepared for you. You will take this form to the jury room and when you have reached unanimous agreement as to your verdict, you will have your foreperson fill in, date and sign the form. You will then return to the courtroom and your foreperson will give your verdict.

It is proper to add the caution that nothing said in these instructions and nothing in the form of verdict is meant to suggest or convey in any way or manner any intimation as to what verdict I think you should find. What the verdict shall be is the sole and exclusive duty and responsibility of the jury.

⁸⁷Source: *Power Integrations* Final Instructions; Delaware Uniform Instructions.

9.3. DUTY TO DELIBERATE [AGREED]⁸⁸

Now that all the evidence is in and the arguments are completed, you are free to talk about the case in the jury room. In fact, it is your duty to talk with each other about the evidence, and to make every reasonable effort you can to reach unanimous agreement. Talk with each other, listen carefully and respectfully to each other's views, and keep an open mind as you listen to what your fellow jurors have to say. Try your best to work out your differences. Do not hesitate to change your mind if you are convinced that other jurors are right and that your original position was wrong.

But do not ever change your mind just because other jurors see things differently, or just to get the case over with. In the end, your vote must be exactly that — your own vote. It is important for you to reach unanimous agreement, but only if you can do so honestly and in good conscience.

No one will be allowed to hear your discussions in the jury room, and no record will be made of what you say. So you should all feel free to speak your minds.

Listen carefully to what the other jurors have to say, and then decide for yourself.

⁸⁸Source: *Power Integrations* Final Instructions; Delaware Uniform Instructions.

9.4. COURT HAS NO OPINION [AGREED]⁸⁹

Let me finish up by repeating something that I said to you earlier. Nothing that I have said or done during this trial was meant to influence your decision in any way. You must decide the case yourselves based on the evidence presented.

⁸⁹Source: *Power Integrations* Final Instructions; Delaware Uniform Instructions.

Dated: February 5, 2007

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